

The cover features a vibrant, abstract design with overlapping circles and bands in shades of blue, green, purple, and yellow. A fine grid of small white dots is overlaid on these shapes. The text 'Annual Report 2006' is centered in a white, sans-serif font. At the bottom, the words 'ANNUAL REPORT' are written in large, semi-transparent letters that blend with the background colors.

Annual Report 2006

→ Editorial

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Martin Bartenstein
Federal Minister of Economic Affairs
and Labour

During its Presidency of the Council Austria worked with the European Commission to lay the groundwork for a new EU energy policy. At the heart of this policy is the energy package, which gives the EU the tools to overcome the challenges presented by rising global energy demand, persistently high oil and gas prices, member states' growing dependency on energy imports, and increasing political instability in some regions.

One area of energy policy in which Energie-Control GmbH (E-Control) will continue to play a key role is that of the Energy Community. This is an institution designed to help create an internal energy market along EU lines in South-Eastern Europe, and integrate it into the European Community. Austria has succeeded in bringing the Energy Community Secretariat to Vienna. This means that a third international energy organisation, along with OPEC and the International Atomic Energy Agency, is now based in Vienna, cementing the city's role as the energy capital of Europe.

The energy sector inquiry launched by the European Commission in 2005 and completed in January 2007, in which E-Control was involved, found room for improvement in the European electricity and gas markets. The main issues highlighted are price formation, security of supply and

unbundling, which in the Commission's opinion requires a much tougher regulatory approach. The final report on the inquiry also contains exhaustive analyses of: existing market concentration; obstructionism by vertically integrated companies; market foreclosure; market transparency and access to information; price formation; the balancing markets; long-term gas supply contracts; and liquefied natural gas markets. The Austrian energy sector is not immune to these problems, though the situation is considerably better than in some other member states due to the existence of transparent network access rules.

In 2006 some adjustments that will directly affect E-Control's regulatory activities were made to the legal framework in the light of experience since the full liberalisation of the Austrian electricity and natural gas markets.

The Energy Security of Supply Act 2006 (Energie-Versorgungssicherheitsgesetz 2006), which amends a number of Acts of Parliament in the interests of supply security, transposed the EU directives on the promotion of co-generation and concerning measures to safeguard security of natural-gas supply. The Act lays down, inter alia: the government's emergency intervention powers in respect of the gas sector; system operators' obligations in respect of congestion management; the safety, reliability and quality standards applicable to system services; the extension of the regulatory system to cross-border natural gas transportation; rules concerning the supplier of last resort; minimum requirements for bills, information and advertising materials; the right of the regulatory authorities to be consulted; and the rules of procedure and representation of E-Control.

E-Control demonstrated its ability to handle exceptional situations effectively when responding to the supply shortages caused by the gas dispute between Russia and the Ukraine at the start of 2006. Thanks to its well organised coordination, this period of difficulty was surmounted without negative consequences for consumers. This shows the wisdom of the decision to give E-Control a central role in proactive crisis management, in addition to its core responsibilities, under the Energy Security of Supply Act. Austria is thus well prepared for similar situations, which cannot be excluded – one need only think of the energy stand-off between Russia and Belarus at the start of 2007.

The Green Electricity (Amendment) Act 2006 (Ökostromgesetz-Novelle 2006) significantly changed the support payments for renewable electricity generation and combined heat and power (CHP) stations. A budget cap was introduced, the arrangements for funding the budget changed over to a system based on a lump sum

per metering point, a separate green electricity settlement agent created, and the support regime extended from existing and modernised plants to new CHP and hydro power stations with maximum electric capacities of between 10–20 MW. E-Control has extensive responsibilities with regard to the implementation of the green electricity support payment regime.

I should like to take this opportunity of thanking the chief executive of E-Control, Walter Boltz and all his staff for their commitment in performing the many regulatory duties, and for the excellent cooperation with the Ministry of Economics and Labour.



Martin Bartenstein



Walter Boltz
Chief Executive Officer
Energie Control GmbH

2006 was a big year for E-Control in a number of ways. In the first place, we were able to celebrate E-Control's fifth jubilee, and October marked the fifth anniversary of electricity and the fourth of gas liberalisation. And there was plenty of reason to celebrate, for all the criticism – despite the fact that both Austria and the whole of Europe still have a long way to go before one can speak of a functioning internal market.

Many were amazed when Austria succeeded in keeping to its 1 October 2001 date for liberalisation. It went on to achieve the complete electricity market opening ahead of the schedule laid down by the EU Electricity Directive, and was thus among the front-runners in Europe. More than five years have passed since then, and as a result, one can say that Austria has handled the first phase of liberalisation very well in comparison with most other member states.

Before liberalisation Austrian electricity prices for small and medium-sized enterprises, and industrial consumers were among the highest in the EU, and by the start of 2006 they had improved its standings in the European league tables across the board. The first phase of liberalisation has benefited all groups of consumers in Austria. Despite massive increases in primary energy prices domestic tariffs have risen moderately compared to most other member states.

It would be pleasant to be able to say that all is going well in Austria, but unfortunately this is not the case. For almost two years now, the energy situation in the EU as a whole and in Austria has been deteriorating. It is now on a knife edge, and action is urgently required if the benefits of liberalisation are to be preserved.

Due to large mergers and deficiencies in the implementation of EU directives there is little competition on European energy markets. Austria is not immune to this problem, as recent reports by the European Commission attest.

If Austria is to continue to enjoy cost advantages vis-à-vis other European countries, more will have to be done on the competition front. Only if suppliers are forced to fight for customers will energy liberalisation be a long-term success.

The New Year will thus hold further exciting challenges for us, and will be no less busy than its predecessor. Without the energy and dedication of E-Control's staff we would not be able to meet all the demands placed on us; and I should like to thank our people for their contribution. I should also like to express my gratitude to all our partners and to the industry for the spirit of good will and cooperation manifested during the year.

I look forward to a continuation of this cooperation in 2007.

Walter Boltz



Walter Barfuß
Director General of the Federal
Competition Authority and Chairman
of the E-Control Supervisory Board

2006 was a highly eventful – and hence particularly busy – year for the entire energy sector, including the Austrian energy regulator, E-Control, established in 2001.

The year began with an immediate bombshell, on 1 January, in the shape of a gas crisis, triggered by a price dispute between Russia and Ukraine, which affected the whole of Europe. Fortunately, this did not cause any very serious gas supply problems for Europe as a whole or Austria. However, the crisis did keep the energy minister, Martin Bartenstein, his civil servants and the Austrian energy regulator on the go, coming as it did at the very start of the Austrian EU Presidency. It also brought home to everyone what a sensitive and increasingly fraught issue energy supply has become at national, European and global level. Since that New Year's Day, at the latest, energy supply security and sustainability, and European competitiveness have been very high on the political agenda.

This backdrop, with its profound and painful economic, legal and social implications for Europe, created a much increased need for regulatory action at European and Austrian level in 2006 and beyond. E-Control, too, was obliged to step

up both its electricity and its gas regulation activities significantly in 2006. The work ranged from the steadily growing activities at European level and regulation in the widest sense, through to the active, expert assistance given to the Federal Competition Authority (FCA) in connection with the general investigations of the Austrian electricity and gas industries (the so-called “sector investigations”) required by the Competition Act 2002 (Wettbewerbsgesetz 2002). In my capacity as General Director of the FCA, I was able to present the final reports of both investigations in November 2006.

As head of the FCA I should like to express my warm thanks to the management of E-Control and their team for the excellent cooperation between our two authorities, and as Chairman of the E-Control Supervisory Board, my gratitude to them for their good judgment and a job well done during the year. This Annual Report can only give a superficial impression of all the effort that goes into this work, and I should like to thank them for this on behalf of the entire Supervisory Board.

I am glad to say that the Austrian energy regulator is set for another successful year's work in the interests of both the energy sector and consumers in 2007.

Walter Barfuß



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Introduction – 2006
Highlights of

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→ Regulation at Community level

Europe was hit by an energy crisis at the very start of the year. Due to a price dispute between Russia and Ukraine the Russian gas supplier Gazprom/Gazexport halted deliveries to Ukraine on 1 January 2006. Although the Russian contractual partners gave assurances that supplies to Western Europe would not be affected, pressure in the import pipelines fell. However, due to well filled storage capacity there was little overall effect on West European supplies. Fortunately, the dispute was settled by 4 January, and there were no further constraints on deliveries from Russia.

While these events had scant economic impact their political effect was all the more lasting. The crisis demonstrated for all to see how dependent Europe is on energy supplies from third countries and how vulnerable the European economy has become as a result.

Europe's energy-supply situation is undergoing a fundamental transformation:

- Global energy demand is set to rise by about 60% by 2030. While Europe and the USA are partly responsible for this trend, the main contributors to demand growth are the rapidly growing Chinese and Indian economies.
- European hydrocarbon resources are steadily shrinking. Today the EU imports about half of its total primary energy requirements, but by 2030 the proportion will have risen to almost 70% (over 90% of oil and 80% of gas consumption).
- Oil and gas prices will continue to climb. From about \$10 per barrel in the winter of 1998/99, oil prices have risen more than six-

fold over the past seven years. Due to steadily increasing exploration costs oil and gas prices are bound to continue to climb over the longer term.

- Meanwhile, the environmental impacts of CO₂ emissions are exercising a growing influence on energy policies and markets.

The European Union wishes to confront these challenges by pursuing a common integrated European energy policy with both internal and external dimensions. In the words of Commission President José Manuel Barroso: "The external aspects of energy policy must be seen together with the internal aspects. The two must go hand in hand, not walk in separate directions. And to have a successful external policy, we must have a strong internal policy. That is the clear lesson of 50 years of European integration."

This integrated energy policy is aimed at maintaining and strengthening European competitiveness, attaining environmental policy objectives and securing energy supplies:

- Competitiveness: creation of a true internal electricity and gas market, strengthening of competition, expansion of supply infrastructure, and the creation of trans-European electricity and gas networks;
- Sustainability: increased use of renewable energy sources, improved energy efficiency, enhanced nuclear safety and security, research and development ("clean coal mechanisms" and CO₂ sequestration), and emission trading;
- Security of supply: increased international dialogue, oil and gas emergency stocks, and diversification of energy sources and supply routes.

→ Common external EU energy policy

Key decisions opening the way for an external EU energy policy were made between the EU summits at Hampton Court (October 2005) and Lahti (November 2006). The aim is a common policy (“speaking with a single voice”).

The European Neighbourhood Policy (ENP) was developed in response to the changed geopolitical situation created by enlargement in May 2004. The ENP lays the foundations for a much deeper political and socio-economic relationship with the EU’s neighbours and aims to increase mutual prosperity, stability and security. The ENP takes account of the vital role played by the EU’s neighbours in its energy security, both as producers and/or suppliers, and as transit countries. ENP Action Plans have been jointly established with individual countries and entire regions. They address issues such as: increased dialogue; convergence of energy policies, and legal and regulatory frameworks; working towards better inter-connection of networks; energy efficiency; renewable energy sources; and nuclear safety. Other ENP initiatives have also been launched. Regional cooperation agreements (the Baku Initiative, BASREC, EUROMED and the Energy Community [South-Eastern Europe]) are being supplemented by bilateral arrangements (Azerbaijan, China, India, Kazakhstan, Moldavia, Norway, Russia, Ukraine and the USA) and cooperation with international organisations (the IEA, the G8 and OPEC). Due to its geographical proximity South-Eastern Europe is the key region for Austria with regard to such contacts. As an EU member state, Austria only has “participant status” in the Energy Community, but it plays an extremely active role in the organisation’s activities.

→ Creation of a South-East European energy market (Energy Community)

Modelled on the European Coal and Steel Community, the Treaty establishing the Energy Community, signed in Athens on 25 October 2005, created the world’s largest internal electricity and natural gas market. The 34 parties to the Treaty are the 25 EU member states, as well as Albania, Bosnia and Herzegovina, Bulgaria, Croatia, the former Yugoslav Republic of Macedonia, Montenegro, Romania, Serbia and the United Nations Interim Administration Mission in Kosovo (UNMIK). Talks are currently being held with Turkey, and Moldavia, Norway and Ukraine, which have observer status at present, have also applied to join. The signature of the treaty marked the completion of the Athens Process set in motion in 2002 when the European Commission made proposals for the creation of a regional electricity market in South-Eastern Europe. The Treaty expands the benefits of the EU single market in energy to the states of South-Eastern Europe, bringing liberalisation and transparency to new customers and creating a stable structure for much-needed investment. It uses the common denominator of energy policy to bring the countries of the region closer together. Austria is playing a special role in the Energy Community, along with fellow EU member states Greece, Hungary and Slovenia, and is subject to measures taken under Title III of the Treaty by virtue of its participant status. The main contribution of the Treaty will be to improve security of supply in the EU and South-Eastern Europe by organising relations between transit and consuming countries, and mutual assistance in the event of disruptions.

Austria's goal is to help the countries of South-Eastern Europe to implement the Treaty by giving them the benefit of its regulatory experience, and by establishing a secretariat responsible for overall coordination and the development of appropriate measures for the creation of a functioning market.

The Treaty provides for the foundation of the following institutions to monitor and coordinate market development.

The Ministerial Council meets every six months. It consists of energy ministers of the member countries and the Energy Commissioner. The Council takes strategic decisions, provides general policy guidance, and adopts or endorses secondary legislation. The Presidency rotates on a half-yearly basis.

The Permanent High Level Group (PHLG) is composed of representatives of the ministers of energy of the contracting parties and the European Commission. The Group is convened, when necessary, on the initiative of either the Commission or the country holding the Presidency at the time, in order to prepare the Ministerial Council and to ensure the follow-up of its decisions. The Commission co-chairs this group together with the Presidency.

The Vienna-based Energy Community Secretariat was set up by E-Control in conjunction with the Ministry of Economics and Labour, and Ministry of Foreign Affairs; it acts as the Community's central coordinating body. It will play an important initiating role in developing the Treaty and in making use of its implementing provisions. It will also be responsible for coordinating international donors, by validating work and proposing technical, legal and regulatory developments.

The Energy Community Regulatory Board (ECRB), located in Athens, held its constituent meeting on 11 December 2006, at which Slave Ivanovski of the Macedonian regulator ERC was unanimously elected as President for one year. The permanent Vice-President is appointed by the European Commission. The ECRB has three working groups, for electricity, gas and customers.

→ Creation of an internal energy market

The European Commission took two major steps towards the creation of an internal energy market in 2006: the publication by DG TREN of a Green Paper entitled "A European Strategy for Sustainable, Competitive and Secure Energy" and the completion of the energy-sector inquiry by DG COMP.

The Green Paper addresses a number of important energy policy issues, including climate change, renewable energy sources, energy technologies and external energy policy. The section on completion of the internal electricity and gas markets is of particular relevance to the implementation of the electricity and gas acceleration directives, and hence to regulators. It focuses on the following core areas requiring special attention:

- A European grid;
- A priority interconnection plan;
- Investment in generation capacity;
- A level playing field: the importance of unbundling;
- Boosting the competitiveness of European industry.

The Commission acknowledges that although progress has been made in many areas it has been too slow.

Insufficient unbundling is seen as one of the key problems. Reports from national regulators clearly reveal that the implementation of the unbundling of vertically integrated electricity and gas companies remains deficient. To date, member states' practices with regard to unbundling have failed to achieve the desired full independence of system operators. In April 2006 the European Commission opened infringement proceedings (letters of formal notice) against 17 member states.¹ Inadequate unbundling legislation was the reason for action against 14 countries.

Other problems faced at present are inefficient use of existing cross-border capacity and underinvestment in infrastructure. At the Barcelona European Council in 2002, the heads of state and government agreed to increase minimum interconnection levels between member states to 10%. However progress has not been satisfactory. There can be no truly competitive and single European market without additional capacity. In many member states, action needs to be taken to free up capacity reserved for former incumbents under long-term electricity and gas contracts. Authorisation procedures for investments in infrastructure and generating stations need to be accelerated. A major debate is also needed on improved coordination of European energy networks, so as to reduce the risk of blackouts such as the one on 4 November 2006 which originated on the E.ON grid in Germany. Future efforts will undoubtedly need to focus on improved coordination between networks and their operators, common, binding security and reliability standards, and a strengthened, integrated supervisory function.

Finally, the Commission notes that the powers of national regulators need to be harmonised. The Green Paper also raises the question as to whether an additional regulatory authority

should be created at European level to deal with cross-border issues, so as to meet the needs of what will initially be regional markets and ultimately a pan-European internal energy market. It remains to be seen whether these tasks should be assigned to the European Regulators' Group for Electricity and Gas (ERGEG), founded in 2003, or whether a new organisation should be established for the purpose.

The Commission unveiled the findings of the final report of the energy sector inquiry on 30 November 2006 (Energy Day 2006). The Commission came to the conclusion that the main obstacles to effective competition are:

1. Market concentration;
2. Vertical foreclosure;
3. Lack of market integration;
4. Lack of transparency; and
5. Price issues.

The Commission has announced that it will use all its competition law and regulatory powers to the full, and strengthen them if necessary, in order to overcome these obstacles to competition.

→ CEER and ERGEG

E-Control belongs to the Council of European Energy Regulators (CEER) and the European Regulators' Group for Electricity and Gas (ERGEG).

The CEER brings together the independent energy regulators of member states of the EU and EEA. Its aim is the creation of an internal European market for electricity and gas.

ERGEG is an advisory group of independent national regulatory authorities established by Commission Decision 2003/796/EC of 11 November 2003 to assist the Commission in consolidating the internal market for electricity and gas.

¹ The second stage of the infringement proceedings under Art. 226 of the EC Treaty was opened in December when the European Commission sent reasoned opinions to the member states concerned. It is now up to the member states concerned to respond to the Commission's concerns, either by notifying amendments to legislation, where the problem was merely failure to do so or – if this is still possible – by rapidly transposing the missing provisions into national law.

The following is a summary of the main activities of the CEER and ERGEG in 2006.

a) Regional initiatives

The development of regional electricity markets and further progress towards the liberalisation of national markets represent important steps towards the goal of an internal electricity market. On 27 February ERGEG launched the Electricity Regional Initiative (ERI) and on 25 April it went on to unveil the Gas Regional Initiative (GRI). The ERI, consisting of seven regional market projects, and the GRI, comprising four projects, are European initiatives, each of which is designed to integrate a number of national markets into a single regional market. The regional initiatives are aimed at identifying and removing barriers to market integration. They will involve close cooperation between regulators, market participants and representatives of the European Commission and governments.

b) Transparency

ERGEG has drawn up Guidelines of Good Practice for Information Management and Transparency for the electricity wholesale market. These seek to ensure that market-related information is made publicly available. ERGEG has recommended to the Commission that all member states be required to implement the guidelines. The regulators have also been collaborating closely with the Commission on the development of transparency rules for the gas sector.

c) Cross-border electricity and gas exchanges

ERGEG has mounted a drive to achieve integration of the electricity and gas balancing markets in order to ensure that market rules do not obstruct trade. The Guidelines for Good Practice for Gas Balancing developed by the regulators

reflect the contribution made by balancing markets to safe and reliable system operation. They contain rules for national regulators, system operators and system users, and define the market information required for efficient functioning of the balancing markets.

ERGEG has also drawn up Guidelines of Good Practice for Electricity Balancing Markets Integration. This document examines the need for balancing-market integration, and the preconditions for it, and makes recommendations concerning further steps. Also relevant to cross-border electricity trade are the ERGEG Congestion Management Guidelines which entered into force on 1 November. In addition, Inter-TSO Compensation Guidelines and Transmission Tarification Guidelines are in the pipeline.

Meanwhile, ERGEG has been investigating whether current arrangements for cross-border gas transportation are efficient. The year saw the publication of the second ERGEG report on the implementation of the Guidelines of Good Practice for Storage System Operators, which finds that compliance remains unsatisfactory in areas such as transparency, access and non-discriminatory treatment of storage users.

d) Consumers

With full electricity and gas liberalisation coming up on 1 July 2007, in 2006 ERGEG made a number of proposals (Best-Practice Propositions [BPPs]) regarding consumer protection (transparent billing, price disclosure and comparisons, contract formulation, supplier switching etc.).

e) Unbundling

During 2006 ERGEG adopted good-practice guidelines on accounting, functional and organisational unbundling.



The legal framework within which the Austrian energy sector operates has been reshaped by the Ökostromgesetz-Novelle 2006 (Green Electricity [Amendment] Act 2006), BGBl. (Federal Law Gazette) I No. 105/2006 and the Energy Security of Supply Act 2006, BGBl. I No. 106/2006.

→ **Green Electricity (Amendment) Act 2006**

The Green Electricity (Amendment) Act 2006, BGBl. I No. 105/2006 was published on 27 June 2006.

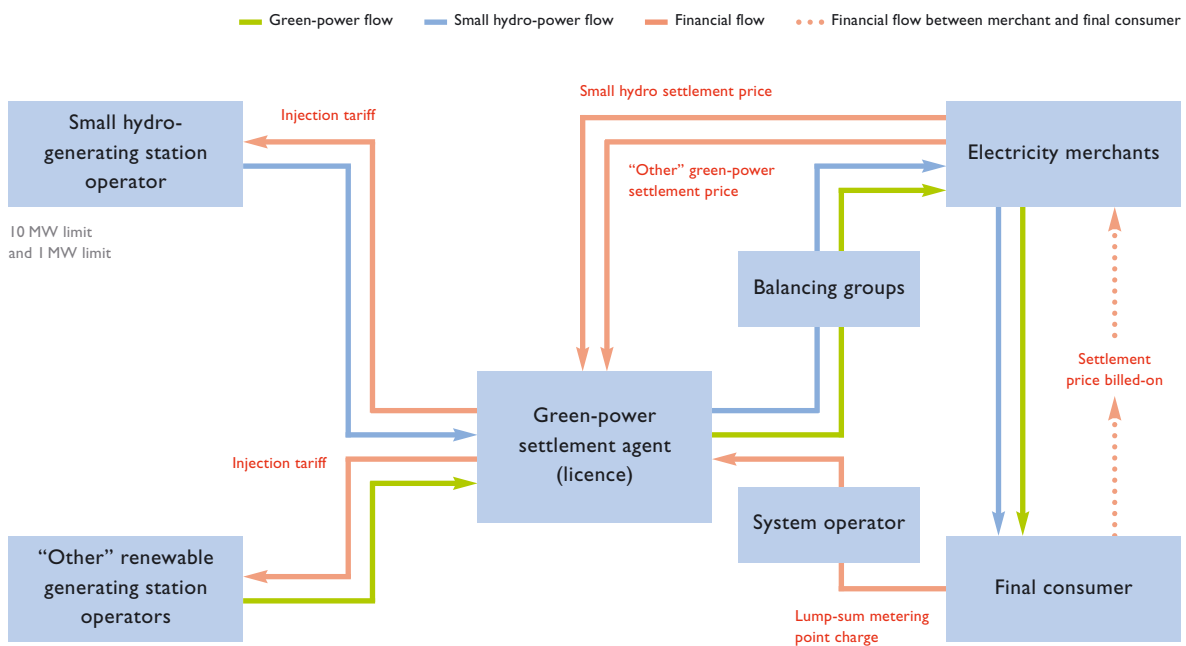
Major features of the Act are:

- Increase in the green-power target (subsidised renewable electricity less hydro power) to 10%;
- Introduction of investment grants for medium-sized hydro power stations (10–20 MW; budget cap €50 million [m]);

- Introduction of investment grants for new fossil fuel CHP stations (budget cap €60m);
- Budget cap of approx. €1 billion (bn) on support payments for new renewable generating stations and investment grants (cumulative amounts over the ten-year feed-in tariff guarantee period plus a further two years at reduced rates);
- Changeover of funding from the previous extra fee per kWh to lump sum per metering point to comply with requirements imposed by the European Commission, and a sharp increase in the settlement prices to be paid by electricity merchants for the subsidised green electricity allocated to them; and
- Creation of a single national clearing scheme through the establishment of a green-power settlement agent (first come, first served principle).

→ **Schematic diagram of the green-power support-payment system following amendment of Green Electricity Act**

Chart I



Wind power, biomass, biogas etc.

Source: E-Control

The Green Electricity (Amendment) Act 2006 topped up the €3bn in existing contractual funding commitments under the Green Electricity Act 2002 by adding some €1bn in support for new renewable generating stations. Of these additional resources, 30% are earmarked for wind power, 30% for solid biomass, 30% for biogas and 10% for other renewable generating stations other than hydro power stations.

Chart I is a schematic diagram of the settlement system under the green electricity support payment scheme as it has been since the establishment of the new green-power settlement agent (www.oem-ag.at). The latter began work on 1 October 2006 having obtained an operating licence from the Ministry in September. It replaces the three former green-power balancing-group representatives.

The Ökostromverordnung 2006 (Green Electricity Order 2006), BGBl. II No. 401/2006 was published on 24 October 2006. This determines the feed-in tariffs for new renewable generating stations where it is possible for the green-power settlement agent to make contracts without exceeding the budget. The Order and a comparison of these new tariffs with those under Order BGBl. II No. 508/2002 of December 2002 are posted on the E-Control² website.

→ Energy Security of Supply Act 2006

The Energy Security of Supply Act 2006 has seven articles, amending the EIWOG (Electricity Industry and Organisation Act), the GWG (Natural Gas Act), the EnIG (Energy Intervention Powers Act 1982), the EBMG (Oil Stockholding and Reporting Act 1982), the E-RBG (Energy Regulatory Authorities Act) and the WettbG (Competition Act).

Among the factors that prompted the many amendments contained in the Act were:

- The expiry of the temporary constitutional powers on which the economic intervention legislation relating to energy was based at the end of 2006;
- The need to transpose recent Community legislation (EU regulations and directives) into Austrian law; and
- The need to improve the legal framework for competition on the Austrian electricity and natural gas markets.

→ Electricity Industry and Organisation Act

The Electricity Industry and Organisation (Amendment) Act 2006 contains measures designed to improve security of supply, including the creation of a legal basis for primary control, market-based congestion management, and on-line data exchanges between market participants and control-area managers.

The amended Act also transposes the CHP Directive (2004/08/EC) (however the implementation of related arrangements such as the determination of efficiency criteria for CHP stations or the issue of guarantees of origin for electricity generated at highly efficient CHP stations is a provincial responsibility).

The consumer protection and pro-competitive measures in the Act comprise a duty on the part of electricity merchants and suppliers to report their general delivery terms to the Energy Control Commission, safeguarding of a basic minimum supply for consumers by naming a supplier of last resort, and increased transparency with regard to the information provided by suppliers

² www.e-control.at

to consumers. Since 1 January 2007 electricity merchants and suppliers have been required to state the system charges and energy price separately in quotations, invoices, and information and advertising materials; the energy price must be expressed in cent/kWh.

Among the pro-competitive measures is action to speed up supplier transfers. The amended Act empowers the Energy Control Commission to require system operators to state in their general terms and conditions the notice period for the electronic communication of the metering point code – the unique identifier for customer installations – to customers and their new suppliers. The same applies to the notice period for supplier transfers. Under an agreement between the regulator and the electricity companies, since 1 January 2007 an amendment to the Other Market Rules has made it sufficient to simply to state the customer's name and address when effecting a transfer.

An amendment to the Act hardens up the power labelling provisions in the Act to bring them into line with the requirements of the Electricity Directive (2003/54/EC). The obligation of electricity merchants and suppliers to disclose the fuel mix and environmental impact (CO₂ emissions and radioactive waste) now extends to promotional materials sent to final customers.

Another matter addressed by the Electricity Industry and Organisation (Amendment) Act 2006 is the adjustment of the domestic legal position to Regulation (EC) No. 1228/2003 on conditions for access to the network for cross-border exchanges in electricity. The Regulation is directly applicable to Austria, but since the EU

has no power to lay down the responsibilities of national authorities, legislation was required for its implementation. The Act names E-Control as the authority responsible for monitoring compliance with the Regulation and the guidelines adopted by the European Commission on its basis, while the Energy Regulatory Authorities Act designates the Energy Control Commission as the authority responsible for granting exemptions for new interconnectors. An enabling provision obliges provincial legislatures to provide for effective, commensurate and deterrent penalties for violations of Regulation (EC) No. 1228/2003 in the implementing legislation.

Other adjustments to the Electricity Industry and Organisation stemmed from experience gained from recent regulatory practice.

→ Natural Gas Act

The changes made by the Natural Gas (Amendment) Act 2006 likewise focus on enhancing security of supply, strengthening consumer protection and competition, and complying with Community standards.

Directive 2004/67/EC concerning measures to safeguard security of natural-gas supply was transposed by the amendments to the Energy Intervention Powers Act and the Natural Gas Act. While the monitoring of supply security and the emergency powers are based on the Energy Intervention Powers Act 1982, the Natural Gas Act contains provisions relating to long-term planning by control area managers and market participants' duty to report information to them which are designed to improve security of supply by enabling preventive measures to be taken.

The amended Natural Gas Act provides for involvement in long-term planning by all market participants, and requires them to furnish the necessary information. It now also requires the market participants concerned (transmission and distribution system operators, holders of transportation rights, storage companies, balancing group representatives and coordinators, producers, suppliers etc.) to cooperate with the control-area managers in the event of seasonal congestion, and to assist them in drawing up congestion management plans.

Capacity management arrangements are to be put in place to prevent contractual congestion and address the need for additional capacity.

Also aimed at improving supply security – as well as stimulating competition on the Austrian gas market – is the transposition of the exemptions for “new infrastructure” (interconnectors between member states, and LNG and storage facilities) provided for by the Gas Directive.

Such infrastructure may, on application, be partly or entirely exempted from regulated system and storage access provided that certain conditions – including the strengthening by the investment of competition on the domestic market and improved supply security – are fulfilled. In addition, the risk associated with the investment must be such that it would not be made unless an exemption was granted.

The security-of-supply measures also include the conferral on the regulator of powers to set standards for the safety, reliability and quality of system services.

Another important aspect of the Natural Gas (Amendment) Act 2006 is the extension of the regulatory system to cross-border shipments (transits), as required by Directive 2003/55/EC. Since 1 January 2007 transmission system operators have been obliged to grant third-party access to their pipelines for cross-border shipments according to general terms and conditions approved by the Energy Control Commission and to make non-discriminatory, cost-reflective use-of-system charges for such services. The methods for calculating the use-of-system charges must be submitted to the Commission for its prior approval.

The amended Act does not change the principle of negotiated access to storage capacity, but the charges must be non-discriminatory. A new feature is the obligation of storage companies to post their prices and the principles on which they are based annually and whenever changes are made.

Similarly to the amended Electricity Industry and Organisation (Amendment) Act, the Natural Gas (Amendment) Act contains consumer protection and pro-competitive measures including a duty on the part of natural-gas merchants and suppliers to report their general delivery terms to the Energy Control Commission, and increased transparency with regard to the information provided by suppliers to consumers. Since 1 January 2007 gas merchants and suppliers have been required to state the system charges and energy price separately in quotations, invoices, and information and advertising materials; the energy price must be expressed in cent/kWh.

→ Energy Regulatory Authorities Act

The amendments to the Energy Regulatory Authorities Act create a legal basis for E-Control to adopt a division of managerial responsibilities, rules of procedure and rules for representation of the chief executive in the event of indisposition, and to assume the new responsibilities conferred on the regulator by the Energy Security of Supply Act 2006.

→ Energy Intervention Powers Act

Following electricity liberalisation, E-Control and the new actors in the market (control-area managers, and balancing-group coordinators and representatives) were built into the industry's crisis intervention mechanisms. However equivalent arrangements for the natural-gas market were lacking until they were included in the 2006 amendments.

Following the example of the electricity sector, the Energy Intervention Powers Act now provides for the enactment of intervention measures for the natural-gas sector by order of the Minister of Economics and Labour. The options open to the Minister range from supply-side action to safeguard natural-gas supply security and control cross-border gas exchanges through to demand-side measures aimed at meeting essential needs, maintaining supplies to domestic and other consumers, and keeping the wheels of the economy turning. The Act transfers responsibility for preparing and coordinating intervention to safeguard gas supplies, and for monitoring gas security of supply to E-Control. The operational implementation of measures ordered by the Minister of Economics and Labour is the responsibility of the control-area managers, in conjunction with the gas companies, including the balancing-group representatives and coordinators.



→ Final report of the electricity industry investigation

Initial situation

Electricity price increases announced, and in part implemented in autumn 2004, affecting both the mass and large consumer markets, and the prospect of further price rises led to heated public discussion of the competitive situation on the Austrian electricity market. Against this backdrop, the Federal Competition Authority (FCA) launched an inquiry into the electricity market (an “industry investigation”), which was carried out in close cooperation with E-Control and also involved the Federal Cartel Prosecutor. The two interim reports on the industry investigation³ analysed the competitive situation on the Austrian electricity market on the basis of survey responses from market participants.

Findings and action required

Entry barriers

The reports demonstrated that entry barriers were obstructing market integration. It was apparent that to all intents and purposes the former monopoly electricity utilities (local players) were still able to behave like monopolists when setting their prices for mass-market customers (mainly domestic, small business and agricultural consumers) within their grid areas. A study of entry barriers revealed that entry is very difficult for new suppliers that do not have an existing customer base. A certain minimum number of customers and/or supply volume (critical mass) is needed to cover the cost of marketing and operating a balancing group. The reluctance of mass-market consumers to switch is a significant obstacle to profitable market entry by new suppliers.

Factors named by the suppliers surveyed as major entry barriers were high system charges,

the difficulty of measuring imbalance risk and heavy administrative overheads. The existence of a multiplicity of switching costs is a further entry barrier.

Dominant firms and their special responsibilities

Both qualitative and quantitative research methods yielded clear indications that the geographic markets for consumers connected to Grid Level 7 (households, small businesses and farms) and, to a lesser extent, for Grid Level 6 consumers (medium-sized enterprises) are confined to very narrow boundaries – namely those of the grid areas of the former monopolists. Calculations of market shares provided strong evidence that virtually all the large suppliers with their own grid areas, which were the local players before liberalisation, hold dominant positions in the small-consumer market.

Both European legislation and domestic electricity law require Austrian electricity companies to play their part in creating functioning competition. Dominant firms also have a special responsibility not to further impair the enfeebled competition in their markets. This means that they are prohibited from certain forms of behaviour and competitive practices that would give no cause for concern in the case of other, non-dominant companies. In the electricity sector this is principally a matter of contract formulation, but the overall transparency of price information is also an issue. Action to improve price transparency and consumer protection forms part of the competition stimulation package put forward by the FCA and E-Control.

Market concentration instead of integration

The findings of the industry investigation also suggested that some rulings on mergers in the electricity sector had been based on overly optimistic assumptions with regard to market

³ See General investigation of the Austrian electricity industry by the Federal Competition Authority, 1st interim report, December 2004: <http://www.bwb.gva.at/NR/rdonlyres/482283D0-BC87-46E6-A985-559E03C23B83/19897/1stinterimreportengl.pdf>

integration. For instance – contrary to expectations in 2001 – the reduction in the number of competing suppliers caused by the formation of EnergieAllianz has by no means been temporary. Rather than attracting more new suppliers, the Austrian market has actually lost some entrants which have withdrawn again. Barriers to entry and the unwillingness of consumers to switch mean that this situation is unlikely to change in the near future. EnergieAllianz thus continues to hold a dominant position in the retail market. When clearing the “Austrian electricity solution” in 2003, the European Commission continued to anticipate rapid completion of the internal electricity market. Today, however, as the Commission’s sector inquiry⁴ shows, developments on the European electricity market cast doubt on the benefits of the “Austrian electricity solution” in competition terms. These insights, gained in the intervening period, will be relevant to any future merger proceedings regarding a possible successor to the “Austrian electricity solution”.

Action to stimulate competition

Parallel to the preparation of the second interim report on the electricity industry investigation, E-Control and the FCA drew up proposals for a raft of measures designed to stimulate competition. Following intensive discussions between the FCA, E-Control and representatives of the electricity companies, this package is due to be implemented soon. The measures relate to:

- Non-discriminatory treatment of suppliers by system operators with regard to the electronic transmission of system charges billing data;
- Shortening of the overall supplier transfer process from eight to six weeks;
- More transparent customer information and invoices;
- An end to questionable practices with regard to adjustments to all-inclusive prices;
- A code of conduct for suppliers, and
- A factsheet for consumers.

No agreement was reached with the electricity industry associations on:

- Detailed itemisation of energy prices and system charges in customer communications;
- Effective implementation of the statutory unbundling requirements;
- The establishment of a central database for the administration of all metering points; and
- Effective monitoring of compliance with the competition stimulation measures by the FCA and E-Control.

The voluntary commitments sought from the electricity companies regarding the transparency of agreements, invoices, and information and advertising material have been replaced by legislative measures. The relevant provisions of the Energy Security of Supply Act 2006 entered into force on 1 January 2007.

Summary and conclusions

As the first and second interim reports on the electricity industry investigation found, there is still little competition for customers. The reasons for this are complex, but lie mainly in the dominance of the former monopoly suppliers, which has been strengthened by a number of mergers.

The proposals drawn up by the FCA and E-Control for action to boost competition (the “competition stimulation package”), which were primarily meant to rely on voluntary commitments by the electricity companies, only in part won the backing of the industry pressure groups – the VEÖ (Association of Austrian Electricity Companies) and VÖEW (Federation of Austrian Electricity Utilities). These measures are currently being implemented by the companies. The important issue of monitoring of compliance with the competition stimulation package remains unresolved. E-Control and the FCA have left no doubt about their preference for monitoring by government agencies.

⁴ See the executive summary of the preliminary report published in February 2006: http://ec.europa.eu/comm/competition/antitrust/others/sector_inquiries/energy/execsum.pdf.

To sum up, at present by no means all of the improvements proposed by the FCA and ourselves are being put into practice by the electricity companies. The regulatory authorities must therefore continue to pursue the goal of stimulating competition on the electricity market, and apply strict yardsticks when monitoring fulfilment by the electricity companies of the commitments they have made. The effects of the package will need to be evaluated at a later date.

→ **Final report of the gas industry investigation**

Initial situation

In September 2005 the Federal Competition Authority (FCA) published the first interim report of the gas industry investigation, which it prepared in cooperation with E-Control.⁵ The report identified the following issues with regard to the development of competition on the Austrian gas market:

- Unequal competitive conditions: advantages for EconGas through its links with OMV Gas;
- Hesitant progress towards the development of short-term gas trading at the Baumgarten hub;
- Obstacles to access to transit capacity;
- Market foreclosure through long-term contracts;
- Barriers to entry of the retail market.

Developments since the first interim report

Changes in the legal framework: amendments to the Natural Gas Act

Consumer protection has been strengthened by the statutory obligation of suppliers to obtain E-Control's approval for their general terms and conditions, and itemisation of energy prices – a direct consequence of the gas industry investigation. Other amendments of direct relevance to competition are the changeover from nego-

tiated to regulated third party system access for cross-border natural gas transportation (transits) and the conferral on the regulator of powers to set standards for the safety, reliability and quality of system services.

Structural changes: changes in the import contracts in September 2006

OMV Gas has ceased to be a buyer on the wholesale market or a supplier of large distributors; the latter are now directly active on the wholesale market.

Findings

Distorted competition: advantages for EconGas through its links with OMV Gas

Under earlier contracts OMV Gas charged different mark-ups on sales to EconGas and non-EconGas provincial gas-transmission companies. This was investigated as a possible instance of discriminatory treatment. It was found that the differentials could not be explained by differences in the risks associated with supplying EconGas and non-EconGas provincial gas-transmission companies. However, they did reflect the assumption by the OMV Group of business risk on behalf of EconGas. This situation was not changed by the restructuring of the import contracts, since EconGas was only able to negotiate a direct agreement with Gazexport because of a guarantee extended by OMV.

OMV Gas was previously in a position to use the mark-ups on its gas to influence the procurement costs of EconGas' competitors. The suspicion that it had exploited this opportunity was not entirely dispelled by the investigation. The FCA and E-Control therefore welcome the withdrawal of OMV gas from wholesale business and its decision to divest its interest in Gas- und Warenhandelsgesellschaft GmbH (GWH).⁶

⁵ Federal Competition Authority, General investigation of the Austrian gas industry under section 2(1)(3) Competition Act, BGBl. I No. 62/2002, Vienna, September 2005, posted at www.bwb.gv.at/BWB/Aktuell/Archiv2005/1zbgas.htm (German version only).

⁶ GWH is a subsidiary of Gazprom (50%), in which Centrex holds 24.9% and OMV Gas 25.1%.

The new import arrangements will put a stop to the “purchasing cooperative” run by the former provincial gas-transmission companies, which led to uniform purchasing prices. This will also open the way for more competition at the second-level wholesale trading stage, which would have a positive impact on the retail markets. The FCA and E-Control have therefore supported this unbundling of procurement arrangements in the Austrian gas industry.

Development of short-term gas trading at the Baumgarten hub (CEGH)

The development of trading activities at the Baumgarten gas hub has made significant strides. The transparency of the information published by the operator, Central European Gas Hub (CEGH) has improved, and traders’ transaction costs have fallen. CEGH needs to make further progress in this direction – and, in particular, to take account of the requirements of domestic and international gas traders – if the gas hub is to develop into a true regional market that is not only used by traders operating in Italy.

It is still too early to make a final judgment as to whether Baumgarten has become the functioning hub to which EconGas committed itself prior to the merger. Further development of the trading activities still appears to depend on the liquidity created by the gas-release programme, meaning that the annual auctions conducted by EconGas will continue to be needed.

Long-term contracts

Experience shows that the existing long-term take-or-pay contracts with restrictive clauses are an obstacle to competition in the gas industry. The European Commission stresses that the contracts must be compatible with EU legislation – especially the Treaty Establishing the European Community (TEC) – and may not constitute a barrier to free trade within the Community.

Prohibition of long-term contracts between transmission companies and distributors in Germany

One of the landmarks of 2006 was action by the German Federal Cartel Office against anticompetitive long-term contracts between importers and distributors, which was principally motivated by competition concerns. In a formal prohibition order of 17 January 2006, the Federal Cartel Office informed E.ON Ruhrgas AG that its gas supply contracts with distributors violated European and German competition law due to the combination of the long-term offtake obligations and the high proportion of actual annual requirements met by them.⁷ In particular, the existing contracts signed on 30 September 2006 were declared void, and the conclusion of agreements meeting between 50–80% of requirements with terms of more than four years, or 80–100% of requirements with terms of over two years was prohibited. The decision was immediately enforceable, and E.ON Ruhrgas AG was required to comply with it by 30 September 2006. The prohibition will remain in force until 30 September 2010.

Following the outlawing of long-term contracts the first signs have emerged that alternative suppliers are unable to deliver the free volumes to local distributors.⁸ As a result, municipal utilities are concluding contracts for 80–100% of their gas needs for the permitted two-year periods. However, Austrian companies such as EconGas are profiting from the opening of the German wholesale market, and it is thus too early to judge what the effects on competition will be.

Contractual situation in Austria

Due to the structural changes in the wholesale market and the market for the supply of large distributors, competition issues raised by the existing long-term contracts fall within the competence of the European Commission.

⁷ http://www.bundeskartellamt.de/wEnglisch/News/Archiv/ArchivNews2006/2006_01_17.php

⁸ See energate, 26 September 2006, at www.energate.de

The market for the supply of local distributors is the one that the German Federal Cartel Office wishes to open by prohibiting long-term contracts. The first interim report on the industry investigation found that in Austria this market extended no further than the boundaries of the control areas. Its size in 2004 was approx. 2.2 bn cu m. Some 83% of local distributors' total procurement needs are met by a single supplier – EconGas – under long-term (indefinite term) contracts. These include minimum offtake obligations of 80% of contractual supply. The supplier grants the local distributors options on the remaining 20%. These are thus contracts of the “quasi total requirements coverage” type.

The indefinite-term contracts between EconGas and the local distributors result in market foreclosure, and thus have as their object “the prevention of competition” in the meaning of Art. 81 ECT. Adjustments to the contracts in order to achieve compliance with competition law would not only have to deal with the terms but would also require the deletion of, or a marked reduction in the minimum offtake obligations so as to keep the option of procurement from other suppliers open.

In contrast to the German gas market there is no sign of the emergence of new suppliers (e.g. the marketing subsidiaries of gas producers, or subsidiaries of other European companies). This

situation might change as a result of the development of competition in Germany or the implementation of new pipeline and LNG projects. Given the current supplier structure, scrapping the long-term contracts with local distributors would not displace the existing suppliers, and hence would not lead to any noticeable increase in competition. However, modification of the objectionable contracts with distributors might stimulate competition if there were a significant change in supplier behaviour. The regulatory authorities will therefore be keeping a close watch on the situation and will take further legal action if this appears expedient.

The long-term transit contracts are being looked into by the Commission's sector inquiry, and were therefore not dealt with by the Austrian industry investigation.

There is no evidence that long-term lock-in clauses are a problem on the retail market.

Obstacles to access to transit capacity

The changeover from negotiated to regulated access to transit pipelines is a major step towards a level playing field on the European gas market. Whether the new rules (publication duties and duty to seek approval) are adequate for workable implementation of regulated access will be a matter for the regulatory authorities to assess.

TAG GmbH, BOG GmbH and OMV have announced their intention to expand the capacity of the Austrian transit systems. The system operators have a responsibility to overcome the existing congestion and provide sufficient pipeline capacity to meet demand.

Barriers to entry of the retail market

The first interim report singled out inadequate unbundling,⁹ switching costs, and new suppliers' administrative and marketing expenses as the main barriers to entry to the retail market.

According to the E-Control compliance report, the gas companies have implemented the legal unbundling of system operation from their retail businesses to the extent required by the law. However, in organisational and personnel terms there are still many links between system operation and activities in which companies compete on the market, so there is still room for improvement. The inclusion of "transportation rights holders" in the unbundling rules by the Natural Gas (Amendment) Act 2006 marks a significant advance.

At present, opinion at European level leans towards ownership unbundling as the best way of creating a level competitive playing field. This approach would probably also have the advantage of cutting regulation costs.

The creation of equal competitive conditions – especially between suppliers that are and are not linked to system operators – is also an important issue for the retail market. Legislative changes and revision of the market rules have already brought some improvements (e. g. the obligation to itemise energy prices). However, it will be necessary for the regulatory authorities to monitor the effects of these new arrangements on competition on the retail market and to assess whether they are sufficient. In particular, there is still room for improvement in the switching process.

Dominant companies have a special responsibility to promote the development of competition. This responsibility should again be clearly emphasised.

The FCA and E-Control take the view that the measures contained in the competition stimulation package and not yet backed by new legislation, e. g. the customer factsheets and code of conduct, are applicable to the gas market, as the companies affected are in part the same. The FCA and E-Control will be talking to the relevant market participants about what measures specifically designed for the gas sector are required.

⁹ In this connection "unbundling" is the legal, organisational and accounting separation of monopoly activities from those that are exposed to competition.



Developments on
the electricity market 2006

ANNUAL
REPORT



→ **Developments on the Austrian electricity market**

In the 2005 calendar year Austrian final customers consumed 60.2 TWh of electricity, representing a year-on-year increase of 0.8 TWh or 1.4%. Final consumers withdrew 52.2 TWh from the public grid – up by 0.6 TWh or 1.1%. The use of self-generated electricity by large consumers again grew significantly faster than their offtake from the public grid.

Domestic electricity consumption (total consumption by end-users plus system losses and generators' own use) rose by an annual average of 2.3% over the ten years to 2005 while the

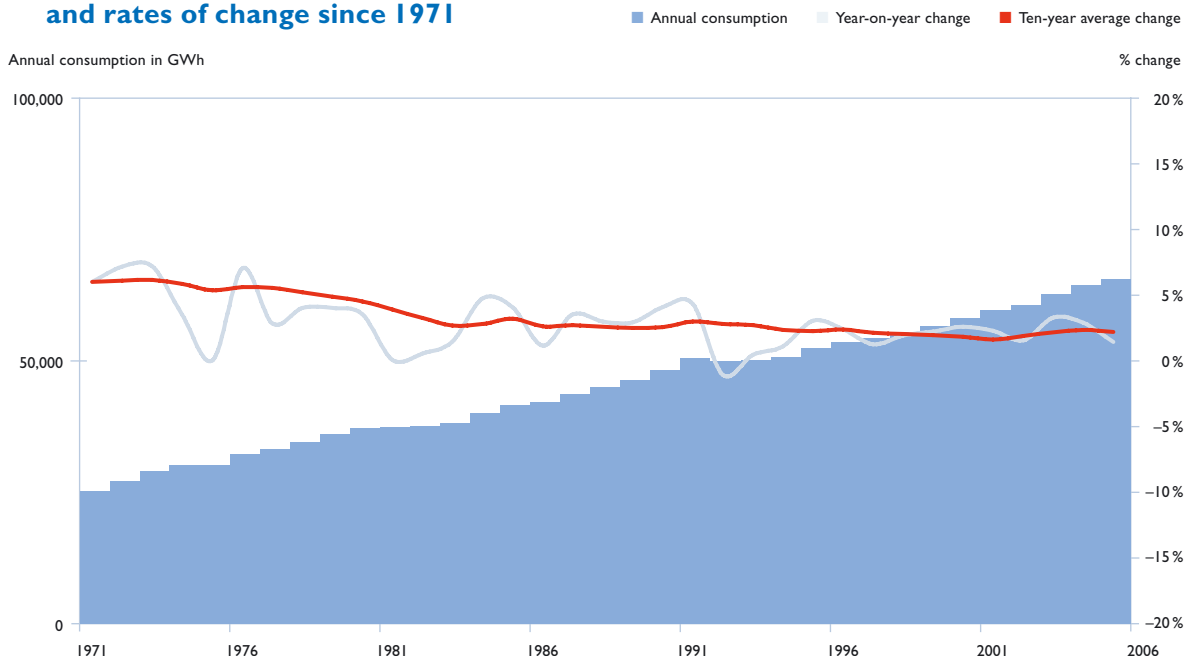
gain in consumption of electricity supplied across the public grid averaged 2.5%. Electricity demand growth has accelerated in recent years (Chart 2).

Demand growth over the first three quarters of 2006 was significantly higher than in 2005. A total of 49.5 TWh of power were consumed in Austria – up by 1.7 TWh or 3.6% – whereas demand expanded by 0.9% in the same period of 2005.

Withdrawals from the public grid are forecast to increase by 3.2% over 2006 as a whole. A total of 42.6 TWh was withdrawn from the public grid in the first nine months of 2006 – 1.8 TWh or 4.5% more than in the same period of 2005.

→ **Evolution of energy demand: domestic electricity consumption and rates of change since 1971**

Chart 2



At 48.6 TWh, generation by domestic power stations in the first three quarters of 2006 was 0.9 TWh or 1.8% down year on year. Water supply in the first nine months of 2006 was 5% below the long-term average and 9% down year on year, and the energy capability factor was 0.95. However, there were strong seasonal fluctuations, and generation by run-of-river power stations declined by 2% year on year to 18.9 TWh. Generation by storage power stations also decreased, by 4% to 8.8 TWh. Output from thermal power stations contracted by 6.3% to 15.8 TWh. Power generation that could not be classified by generating-station types or primary energy sources on an intrayear basis rose by 24% to 5.1 TWh.

Physical power imports registered a year-on-year increase of 0.2 TWh or 1.2% in the first three quarters, and exports were up by 2.4 TWh or 18.3%. This meant that the electricity trade deficit widened by 2.6 TWh to stand at 3.4 TWh.

At the end of September large storage power stations held sufficient water to generate 2.8 TWh, corresponding to 87.3% of storage capacity as compared to 89% a year before.

Meanwhile fossil fuels with an energy content of 6.1 TWh were in storage at thermal power stations, compared to 7.9 TWh a year earlier.

→ Market structure and concentration

Linz AG and Energie AG withdrew from EnergieAllianz in September 2006. According to reports in the media, both have already announced

plans to cooperate with other energy companies, including TIWAG. As with most alliances, these appear to relate to a joint venture or merger in the marketing area. A full merger extending to these integrated companies' system operation activities is not under consideration.

In May 2006 OMV and Verbund announced their intention to merge. The first step would have been the acquisition by OMV of the state holdings in Verbund, and the second a full merger. The companies' aim was to form a vertically and horizontally integrated business. Due to the opposition of TIWAG, EVN and Wien Energie, which hold interests in Verbund, and to political moves and demands by the provincial governors, who are also the shareholder representatives in the various provincial utilities, OMV and Verbund dropped the scheme.

If the plan were to come to fruition at the same time as implementation of the Energie Austria part-merger, the continued existence of the EconGas joint venture and a further increase in Verbund's holdings in Kelag and Steweag-Steg, it could certainly be expected to have a negative competitive effects.

Foreign suppliers still have a very limited presence on the Austrian retail market. They evidently continue to prefer direct investments in Austrian energy companies, such as those of EnBW in EVN, RWE in Kelag and EdF in Steweag-Steg (via Estag). For instance, EnBW has upped its holding in EVN, and is already expressing interest in a further increase.

→ Green power

Output trends

Renewable electricity output trends between 2003–2006 reflected the rapid expansion of wind, biomass, biogas and photovoltaic (PV) capacity since the Green Electricity Act 2002.

As of 30 June 2006, operational wind power capacity totalled 959.89 MW, biomass capacity 234.75 MW and biogas capacity 57.06 MW (Table 1). Some 992.63 MW of wind power capacity (171 wind farms with 641 turbines), 403.03 MW of solid biomass capacity (166 plants) and 81.06 MW of biogas capacity (325 plants) were approved as of 31 March 2006. In addition, by 31 March 2006 a total of 2,421 small hydro-power stations with a combined capacity of 1,149 MW (1,986 existing stations with a capacity of 954 MW plus 214 new plants [129 MW] and 221 rehabilitated stations [66 MW]) had been accredited as small hydro generating stations (maximum

capacity of up to 10 MW). Since many of these small hydro stations can realise higher revenues by selling their power at market prices than at the regulated feed-in tariffs, a considerable number have left the support-payment regime administered by the green-power balancing groups.

Table 2 shows the evolution of Austrian renewable electricity output from 2003–2007 (2003–2005 actual, 2006–2007 estimated).

The estimate for small hydro in 2006 does not take account of the fact that a large proportion of the capacity in place was withdrawn from the support-payment scheme in 2005 and 2006 because of the strong run-up in market prices.

Table 3 compares supported renewable electricity output and subsidy payments in the first half of 2006 (the most recent actual figures based on reports from green-power balancing-group representatives) with the first half of 2005.

→ Accredited renewable generating stations and operational stations under contract to green-power balancing-group representatives,¹⁰ in MW

Table 1

Energy source	Under contract to GPBGR as of 31 Dec. 2003	Under contract to GPBGR as of 31 Dec. 2004	Under contract to GPBGR as of 31 Dec. 2005	Under contract to GPBGR as of 30 June 2006	Accredited stations as of 31 Mar. 2006
Biogas	14.97	28.36	50.67	57.06	81.06
Solid biomass	41.07	87.54	125.95	234.75	403.03
Liquid biomass	1.97	6.84	12.41	12.63	25.17
Landfill and sewage gas	22.73	20.28	21.18	21.63	29.83
Geothermal	0.92	0.92	0.92	0.92	0.92
Photovoltaic¹	14.18	15.07	15.36	16.52	30.30
Wind	395.59	594.56	816.90	958.89	992.63
Total "other" green power	491.43	753.57	1,043.39	1,302.40	1,562.94
Small hydro up to 10 MW²	858.10	851.54	709.69	513.55	1,148.70

¹ Under section 10 (2) Green Electricity Act GPBGRs are obliged to accept electricity from PV systems even if the 15 MW limit has been exceeded.

² Due to the high market price, in 2005 many small hydro-generating stations left their green-power balancing groups during the year, meaning that the figures at the cut-off date are not entirely reliable.

Source: E-Control, GPBGRs – preliminary figures

¹⁰ Deviations from other statistical analyses are possibly due to part-commissioning and incomplete information (only contracts with GPBGRs in force on the respective cut-off dates are taken into account).

At 6,293–7,793 GWh, estimated supported green-power output in 2007 represents 11.6–14.3% of the projected total power supply to final consumers from the public grid (54,373 GWh).

An estimated 2.8–5.5% of total supply (1,500–3,000 GWh) will be contributed by supported small hydro-generating stations and 8.8% (4,793 GWh) by “other” supported renewable sources.

→ Supported renewable electricity output, 2002–2007 (2006 and 2007 estimated) Table 2

Energy source	2002	2003	2004	2005	2006	2007
Wind	203	366	924	1,328	1,680	2,100
Solid biomass	95	99	313	553	1,365	2,000
Biogas	20	42	102	220	300	500
Liquid biomass	3	2	18	33	84	130
Photovoltaic	3	11	12	13	12	13
Other supported green power	88	78	76	65	50	50 ¹
Total “other” green power	412	598	1,445	2,212	3,491	4,793
Small hydro	4,243	3,386	3,995	3,561	4,411	1,500–3,000 ¹
Total supported green power	4,655	3,984	5,440	5,773	7,902	6,300–7,800

¹ A considerable proportion of the small hydro (and landfill and sewage gas) will withdraw from the support system because higher revenues are realisable on the free market
Sources: E-Control and GPBGRs

→ Supported renewable electricity output and compensation payments in first half of 2006 in comparison with the first half of 2005 Table 3

Energy source	1 st half of 2006			1 st half of 2005		
	Injection volume in GWh	Net compensation in EUR m	Average compensation in Cent/kWh	Injection volume in GWh	Net compensation in EUR m	Average compensation in Cent/kWh
Small hydro	1,081	57.2	5.29	1,909	91.0	4.77
“Other” green power	1,419	144.0	10.15	1,111	102.6	9.23
Wind	811	63.1	7.78	711	55.1	7.75
Solid biomass inc. HBF wastes	382	48.1	12.59	255	26.9	10.55
Biogas	173	23.8	13.78	90	11.9	13.22
Liquid biomass	19	2.6	13.93	15	2.1	14.00
Photovoltaic	7	4.3	65.88	7	4.3	61.43
Landfill and sewage gas	25	1.9	7.46	32	2.2	6.88
Geothermal	2	0.1	8.31	1	0.1	10.00
Total small hydro and “other” green power	2,500	201.2	8.05	3,020	193.6	6.41

Source: GPBGRs' reports, August 2006 – preliminary figures

→ Evolution of support payments, 2003–2007 (2006 and 2007 estimated)

Table 4

Technology	2003	2004	2005 (subject to possible reduction due to higher market price)	2006 est.	2007 est.a
“Other“ green power	69	104	149	189	286
Small hydro	65	67	57	24	< 24
Fossil-fuel-fired CHP (subject to possible reduction due to higher market price)	76	78	68	38	55
Total	210	249	274	251	365

Sources: E-Control and GPBGRs

Support requirements

An increase in supported “other” green power to 10% of total annual electricity supply by all Austrian system operators to final consumers across the public grid by 2010 is feasible provided that the additional funding approved for this purpose is efficiently used.

Table 4 shows the evolution of subsidies to the three forms of renewable power generation supported under the Green Electricity Act – small hydro power, “other” green electricity and fossil-fuel-fired CHP. The figures for 2006 and 2007 were estimated on the assumption of a market price of 5.5 cent/kWh.

Energy demand forecasts and renewables

According to forecasts published by the WIFO (the Austrian Institute for Economic Research) in June 2005, total Austrian energy demand will rise from 1,080 PJ in 2004 to between 1,250 PJ (high-efficiency scenario) and 1,350 PJ (baseline scenario) by 2020.

Although energy-saving measures could cut total annual final energy consumption by some 100 PJ (28 TWh) by 2020 in comparison to the baseline

scenario, even the high-efficiency scenario yields demand growth of 170 PJ (47 TWh) from 2004.

The WIFO forecasts show final consumption of electrical energy escalating from 215 PJ (60 TWh) in 2004 to between 290 PJ (81 TWh) (high-efficiency scenario) and 320 PJ (89 TWh) (baseline scenario) in 2020. Although energy saving measures could reduce total annual final electricity

→ Estimated additional supply contributions of renewable energy forms

Table 5

	Petajoules
Solid biomass ¹	22
Biodiesel admixture to fuel ²	16
Additional hydro ³	5
Additional wind power ⁴	9
Solar heating ⁵	4
Biogas ⁶	12
Total	68

1 3 m cubic metres of biomass times 2 MWh per cubic metre times 3.6 PJ per TWh

2 5.75% biofuel admixture to 280 PJ of diesel

3 300 MW of new hydro-power times 5,000 h/year times 3.6 PJ/TWh

4 After 2004 500 additional wind turbines with capacities of 2.2 MW (average up to 2020) times 2,200 full-load hours

5 200,000 households times 5,000 kWh per year of solar use times 3.6 PJ per TWh

6 1% of natural gas (300 PJ) plus 1% of electricity consumption (300 PJ) divided by 0.33 efficiency

Source: E-Control

consumption by around 30 PJ (8 TWh) by 2020 in comparison to the baseline scenario, even the high-efficiency scenario results in demand growth of 75 PJ (21 TWh) from 2004.

Estimates of the potential of renewable energy sources differ widely, partly according to the interests of those making them. To arrive at a realistic assessment of the future role of renewables it is not enough to look at technical and theoretical maximum potential; economic viability and environmental compatibility must also be assessed.

The potential growth in the contributions of renewable energy forms to total energy supply by 2020 (as compared to 2004) shown in Table 5

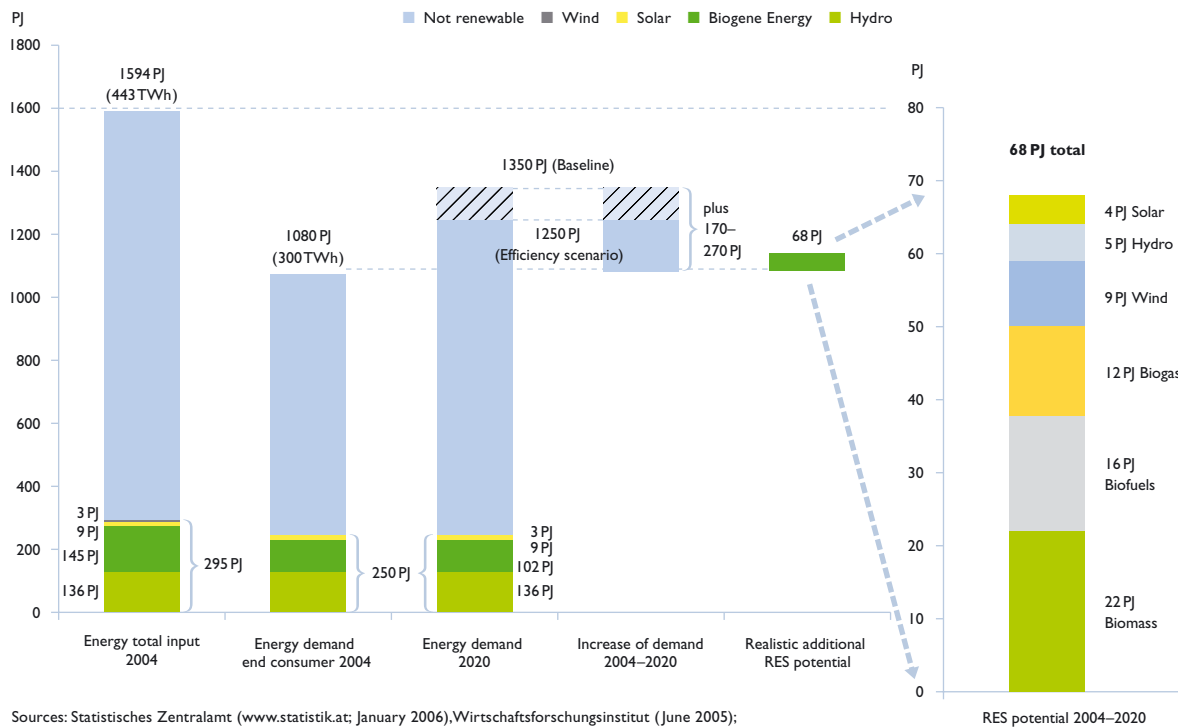
appears realistic on the basis of a variety of sources. The estimates in Table 5 make no claim to completeness, but do indicate a possible trend.

An increase of about 68 PJ in Austrian output of renewable energy would meet only part of the increase in total energy demand from 1,080 PJ in 2004 to at least 1,250 PJ (WIFO high efficiency scenario) in 2020.

The same reservations apply to the growth in the use of renewable energy sources to supply electricity. Chart 3 shows an increase of about 19 PJ (5 TWh) in the use of renewable energy sources to generate electricity between 2004 and 2020 (taking the respective energy-conversion efficiencies of the technologies into account).

→ Total energy supply and renewable energy potential (rough estimates)

Chart 3

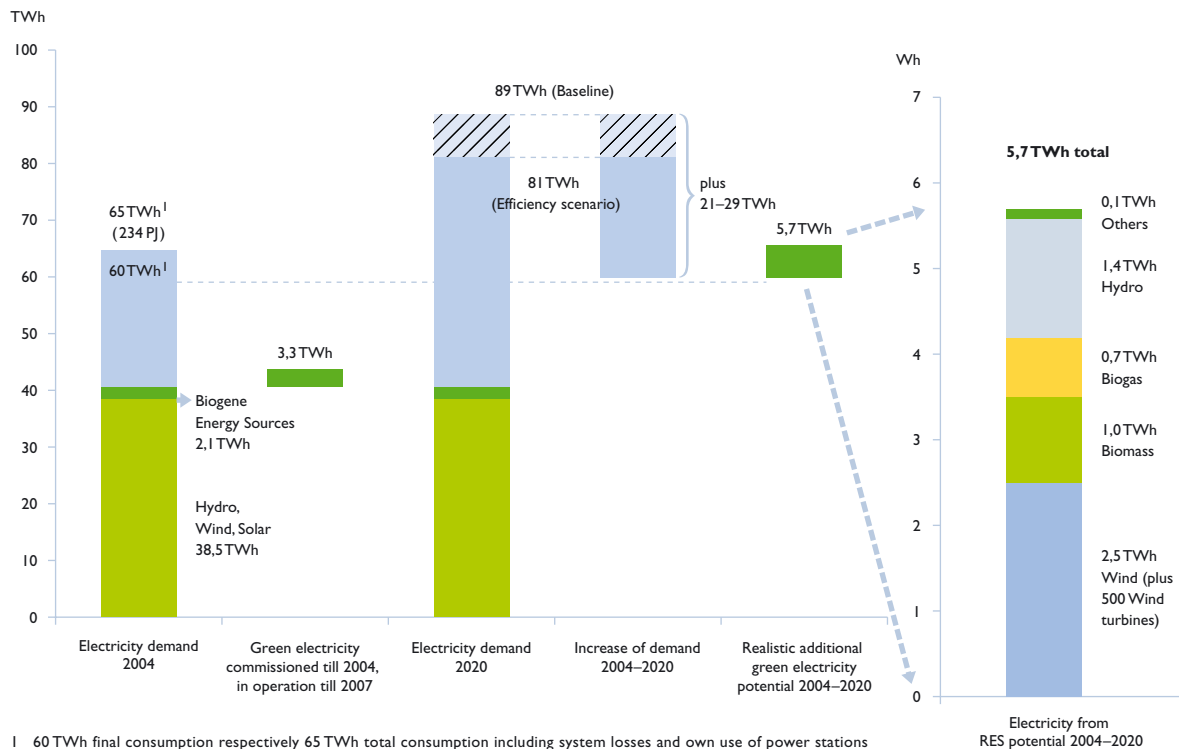


Sources: Statistisches Zentralamt (www.statistik.at; January 2006), Wirtschaftsforschungsinstitut (June 2005); Potentials renewables: E-Control

Source: E-Control

→ Final consumption of electricity and renewable potential (rough estimates)

Chart 4



1 60 TWh final consumption respectively 65 TWh total consumption including system losses and own use of power stations

Sources: Statistisches Zentralamt (www.statistik.at; January 2006), Wirtschaftsforschungsinstitut (June 2005);

Potentials renewables: E-Control

Source: E-Control

Meanwhile, final consumption of electricity advances from 215 PJ (60 TWh) in 2004 to 290 PJ (81 TWh) (WIFO high-efficiency scenario). In the light of the above forecasts and on a realistic assessment of the likely growth in renewable generation, it would thus seem that the latter can only meet some of the increase in electricity demand up to 2020 (Chart 4).

→ Wholesale price trends

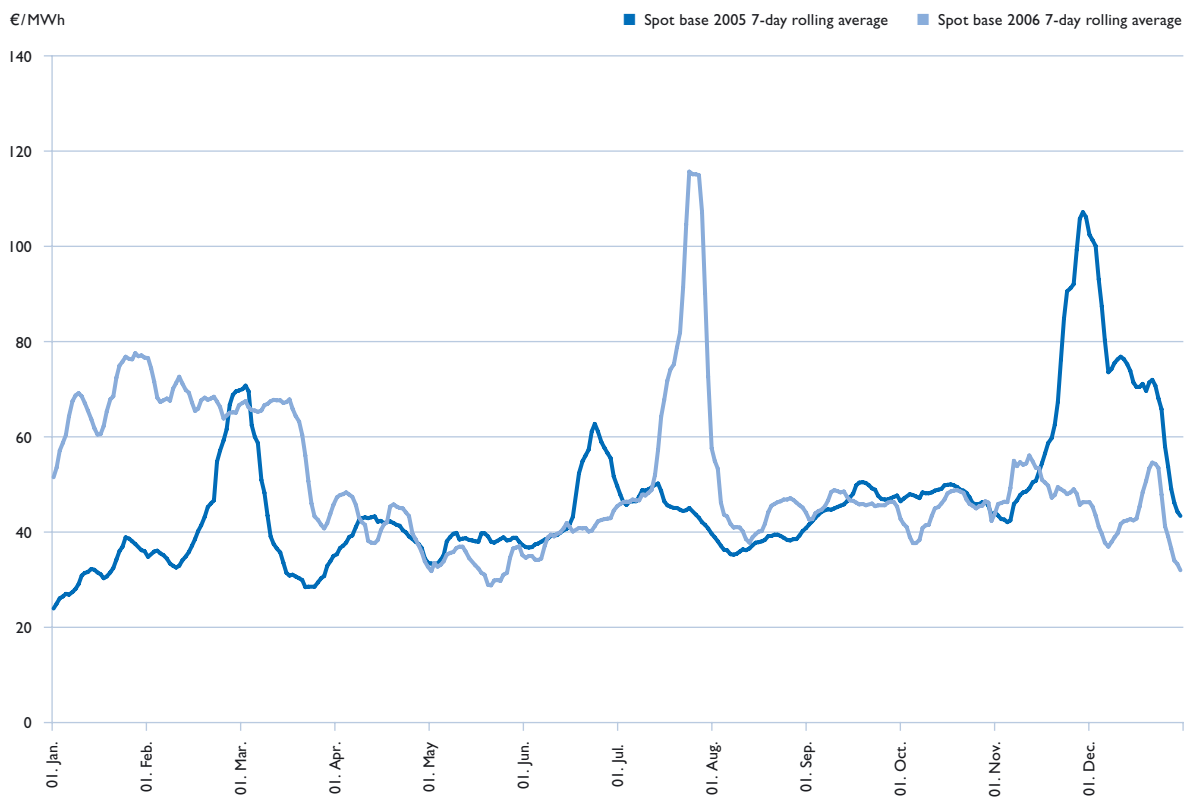
Spot prices were initially relatively firm in 2006, but lost ground in the spring due to the arrival of milder weather and unravelling CO₂ emission allowance prices. The ensuing period of low prices was interrupted by the heat wave at the end of July, which interfered with the cooling

systems of thermal generating stations in France and Germany, causing a power shortage. Over the year as a whole, spot prices averaged just under €51/MWh – over €4/MWh up on the average for 2005 (Chart 5).

Similarly to the previous year, in 2006 futures for year-ahead delivery rose steadily in the early months to reach a high of about €60/MWh in mid-April. Thereafter they plummeted, dropping below €48/MWh within the space of a few

→ Spot-price movements on the EXAA (baseload contract)

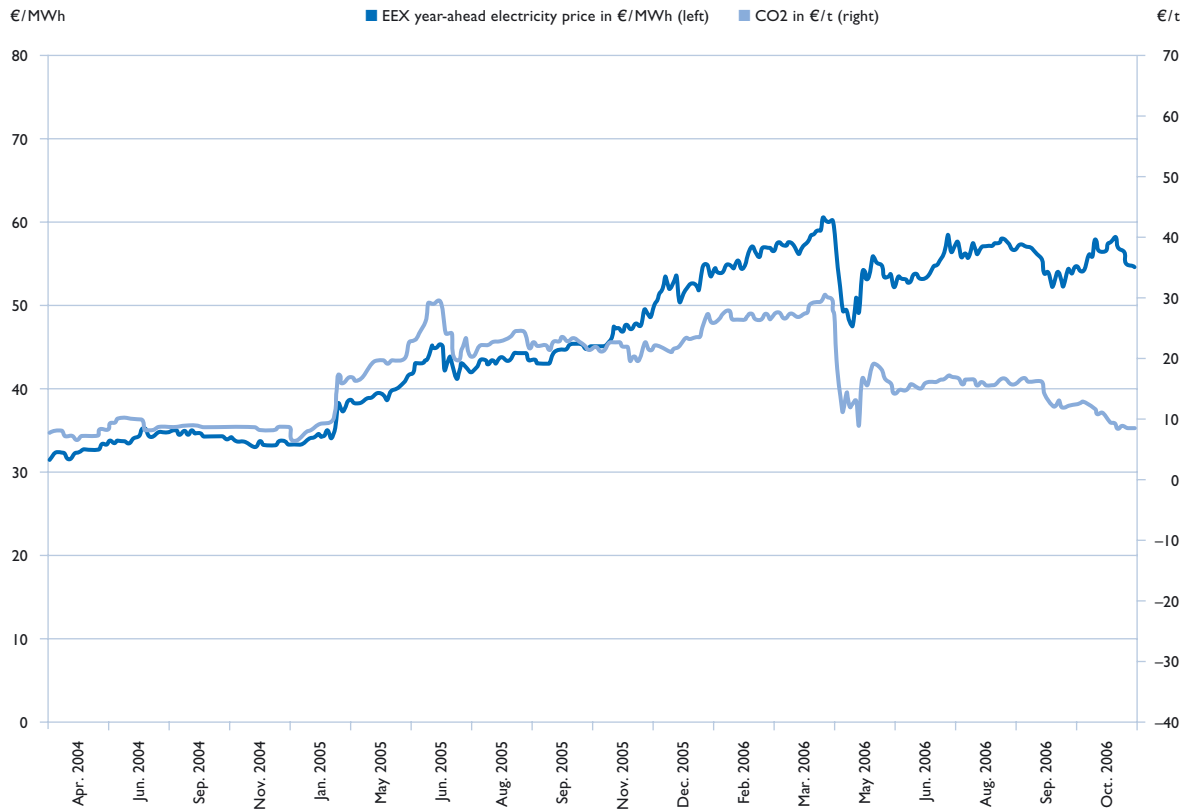
Chart 5



Source: EXAA

→ Futures price trend on the EEX (EEX year-ahead Phelix baseload contract) and CO₂ emission allowance prices

Chart 6



Sources: EEX and Spectron

days. This unexpected fall was a direct result of the dramatic collapse of CO₂ emission allowance prices (Chart 6). Futures prices gradually recovered over the second half of the year while allowances continued to retreat. This apparent decoupling of electricity futures from allowances is surprising given that gas futures – another major influence on prices – also came off in the second half.

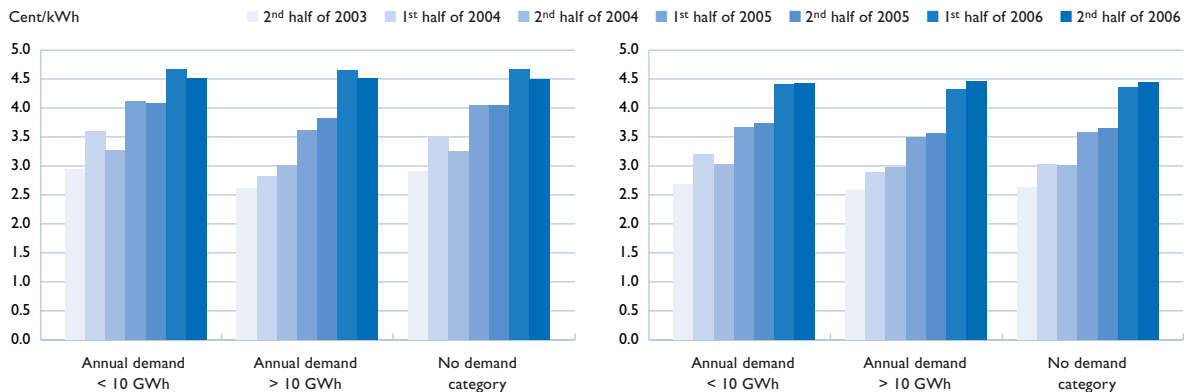
→ Retail price trends

Industrial electricity prices

Since the second half of 2003, E-Control has been surveying the energy prices paid by Austrian industrial consumers directly, on a biannual basis (January and July). The results are posted on our website (www.e-control.at). The survey results

→ Industrial electricity price trends < 4,500 full-load hours (left) and > 4,500 full-load hours (right)

Charts 7a, 7b



Source: E-Control

(Chart 7) show a rising trend since 2003, with most of the price hikes coming at the turn of the year. Industrial electricity prices are mainly driven by wholesale prices, due to the fact that the latter are generally built into price formulas in the supply contracts. The electricity prices under one- and two-year contracts are usually fixed. Some contracts with longer terms contain escalation clauses tied to wholesale prices from the third year onwards.

Domestic electricity prices

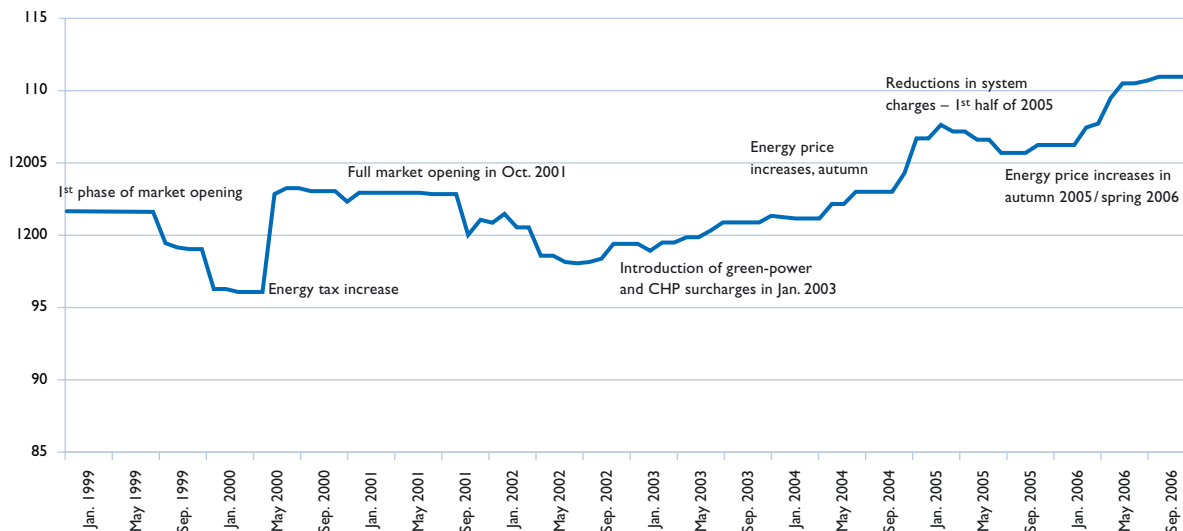
Despite the reductions in system charges in January 2006, the electricity CPI rose again during the year under review. The index covers not only energy prices but also the system charges, taxes and levies paid by final consumers. The rise in the electricity CPI resulted both from higher energy prices and from the introduction of new levies (e.g. the consumption levy in Lower Austria), as well as an increase in green-power support contributions. It was mitigated by the cessation of stranded-costs contributions on 30 June 2006.

Unlike the electricity CPI (Chart 8) the overall domestic prices of the cheapest suppliers in the various grid zones (Chart 9) have been relatively stable over the past 18 months. The price changes at the start of 2006 were due to the reduction in system charges and the termination of rebates. The differences between overall price levels are due to those between the system charges. The gap between the highest and lowest system charges (unit rate, Grid Level 7, non demand metered) is about 25%.

Most of the suppliers have announced further energy price increases for January 2007. The incumbents' energy prices (excluding system charges, taxes and levies) will rise by up to 16%. This leaves aside price increases justified by the so-called "additional expenses" under section 19 Green Electricity Act, which will put up the energy prices by another 10–12% at the start of 2007.

→ Electricity CPI (October 2001 = 100)

Chart 8



Sources: Statistik Austria and E-Control

→ Domestic electricity prices (energy, system charges, taxes and levies), by grid areas (cheapest supplier, 3,500 kWh/year)

Chart 9



Source: E-Control



→ Network regulation: electricity tariff determination

The SNT-VO 2006 Novelle 2007 (System Charges Order 2006 [Amendment] Order 2007) – which came into force on 1 January 2007 – brought adjustments to the use of system and system-loss charges according to the incentive regulation system introduced by the SNT-VO 2006. This system takes account of overall industry trends, the performance of individual firms, company output trends, and uncontrollable cost increases by means of:

- A 1.95% frontier shift;
- Maximum productivity offsets of 3.5%;
- Revenue weighting of volume growth; and
- Cost adjustments on the basis of the system-operator price index.

In determining the equalisation payments for the Upper Austria grid zone, a cost audit and a benchmarking analysis of the Upper Austrian system operators – which had not been included in the analysis performed for the SNT-VO 2006 – were carried out. As a result, the equalisation payments for system operators beyond a certain size now depend on individual efficiency scores instead of an average score. This approach was adopted by the Energy Control Commission in the course of the SNT-VO 2006 tariff review procedures.

The adjustments to the use of system and system-loss charges made by the System Charges Order 2006 (Amendment) Order 2007 reflected a number of exceptional factors which raised costs, namely:

- **Flood damage in 2005:** The effects of flood damage in the Tyrol and Vorarlberg grid zones in 2005 were taken into account.
- **Consumption levies:** In compliance with a verdict of the Constitutional Court, the costs arising from the consumption levy, which had previously to be charged on in the Inns-

bruck and Klagenfurt grid zones, were included in the cost base used to calculate the use of system charges, resulting in an increase in the latter. The consumption levy introduced in Lower Austria in 2006 was included in the system charges for the Lower Austria grid zone. The same took place in the Upper Austria grid zone. The inclusion of the costs arising from the consumption levy in the use-of-system charges has naturally meant that the consumption levy has ceased to be separately charged-on to final consumers.

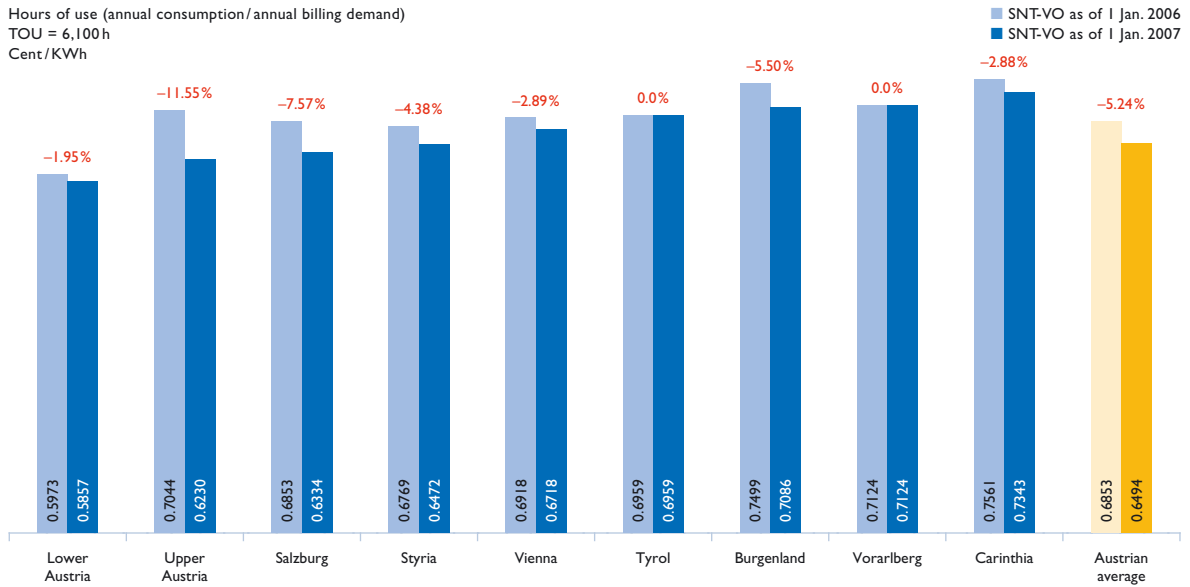
- **Voitsberg III:** The Voitsberg III generating station, in the Styria grid zone, was permanently taken offline in 2006. This will oblige the Styria grid zone to source more power from the upstream network, resulting in higher upstream network costs.
- **European electricity price trend:** Rising European electricity prices impacted the procurement cost of system-loss replacement power.

The adjustment of the tariff of the control-area manager Verbund-APG following a cost audit moderated costs in the Eastern control area. The reduction in the use-of-system charges led to a fall in the upstream network costs incurred by downstream grid zones. At the same time, rising European electricity prices led to higher system and system-loss charges in the Eastern control area.

Charts 10–16 show the nominal adjustments to the use of system charges made by the System Charges Order 2006 (Amendment) Order 2007. Charts 17–21 depict the nominal adjustments to the system-loss charges. The changes in the use of system charges resulted in overall savings of €50m for final consumers. However, these were offset by sharp increases in the system-loss charges, such that the System Charges Order 2006 (Amendment) Order 2007 left the nominal total of the two charges for Austria as a whole unchanged.

→ Use-of-system charges, Grid Level 3

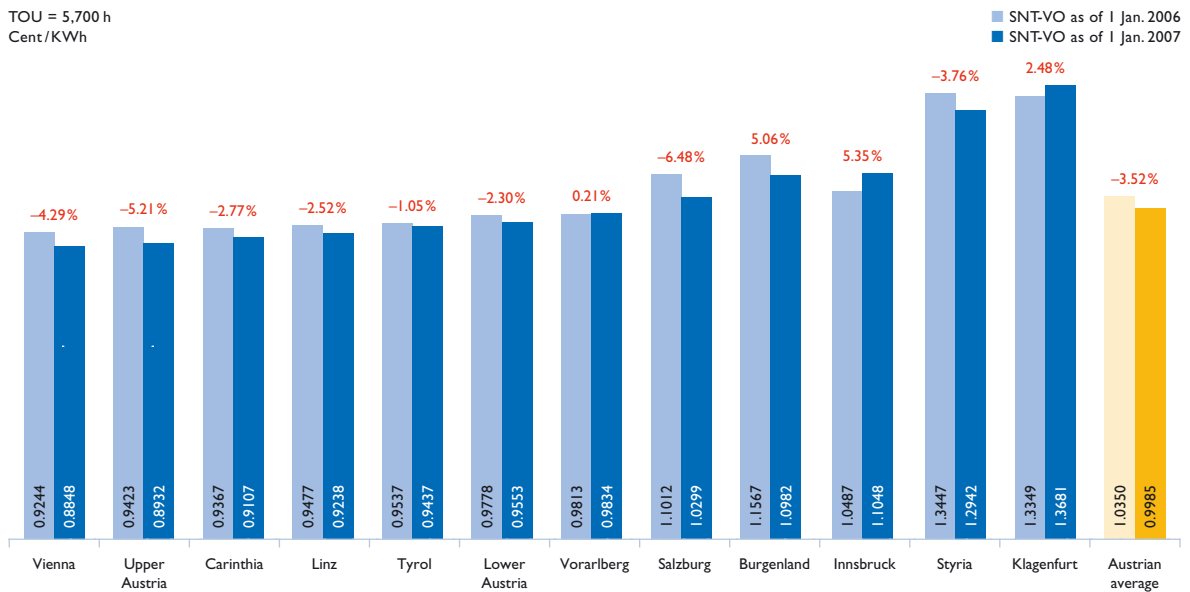
Chart 10



Source: E-Control

→ Use-of-system charges, Grid Level 4

Chart 11

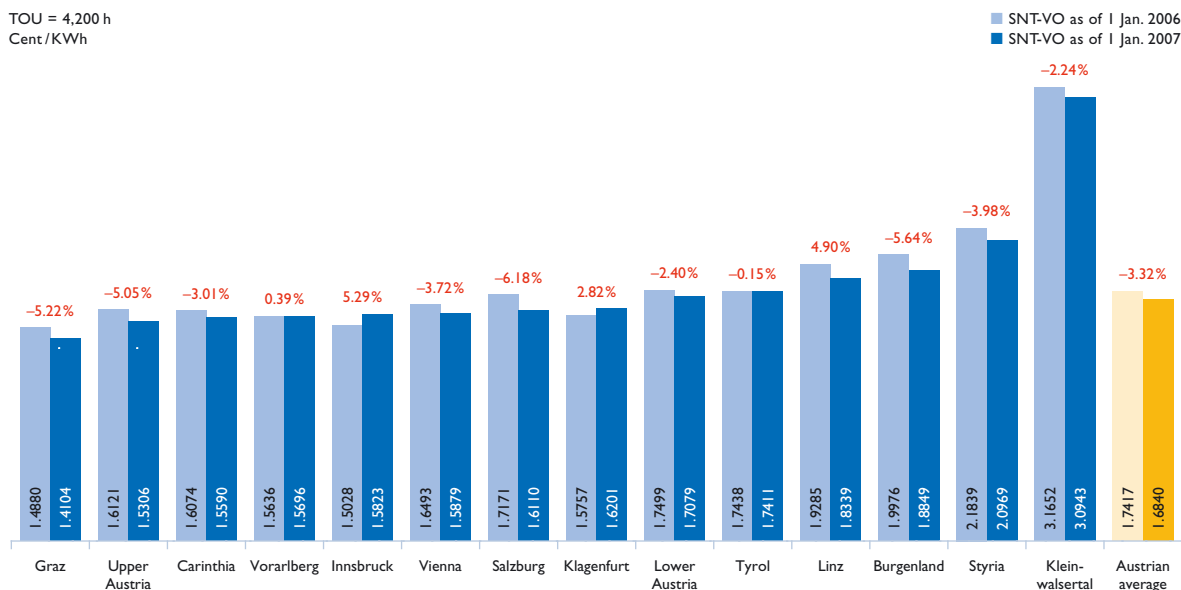


Source: E-Control

→ Use-of-system charges, Grid Level 5

Chart 12

TOU = 4,200 h
Cent/KWh

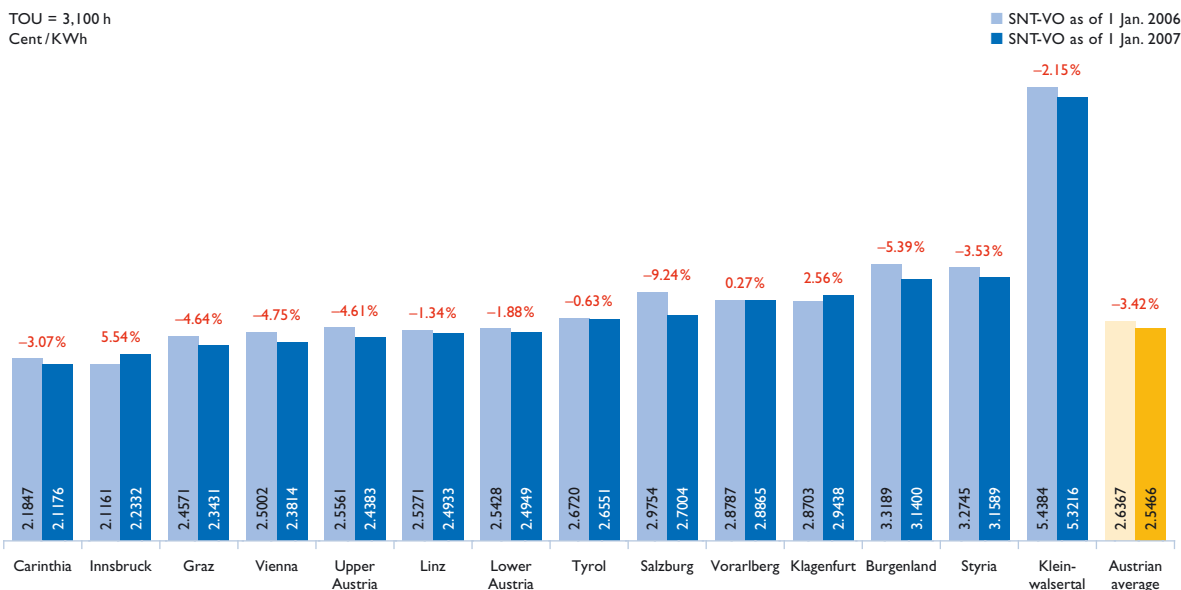


Source: E-Control

→ Use-of-system charges, Grid Level 6

Chart 13

TOU = 3,100 h
Cent/KWh



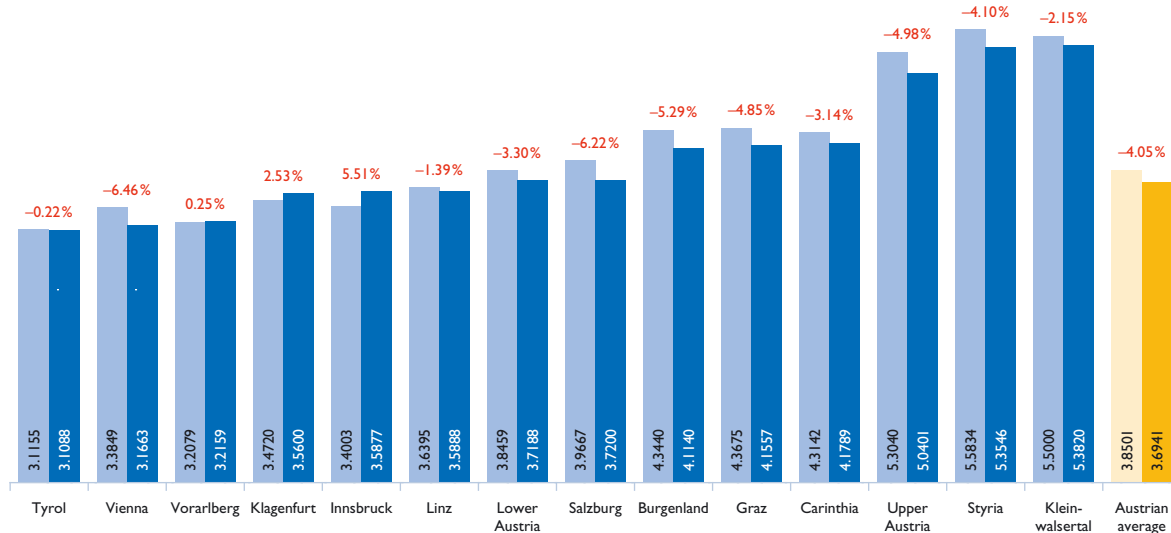
Source: E-Control

→ Use-of-system charges, Grid Level 7 (demand metered)

Chart 14

TOU = 3,000 h
Cent/KWh

■ SNT-VO as of 1 Jan. 2006
■ SNT-VO as of 1 Jan. 2007



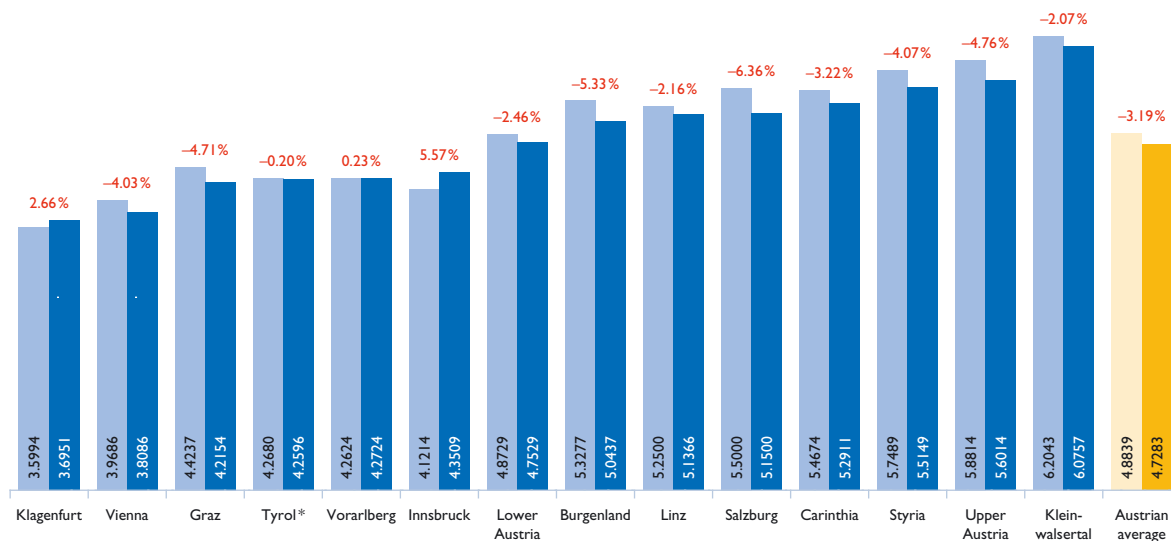
Source: E-Control

→ Use-of-system charges, Grid Level 7 (non demand metered)

Chart 15

Annual consumption of electricity = 3,500 kWh
Cent/KWh

■ SNT-VO as of 1 Jan. 2006
■ SNT-VO as of 1 Jan. 2007



* 3/4 ET, 1/4 DT

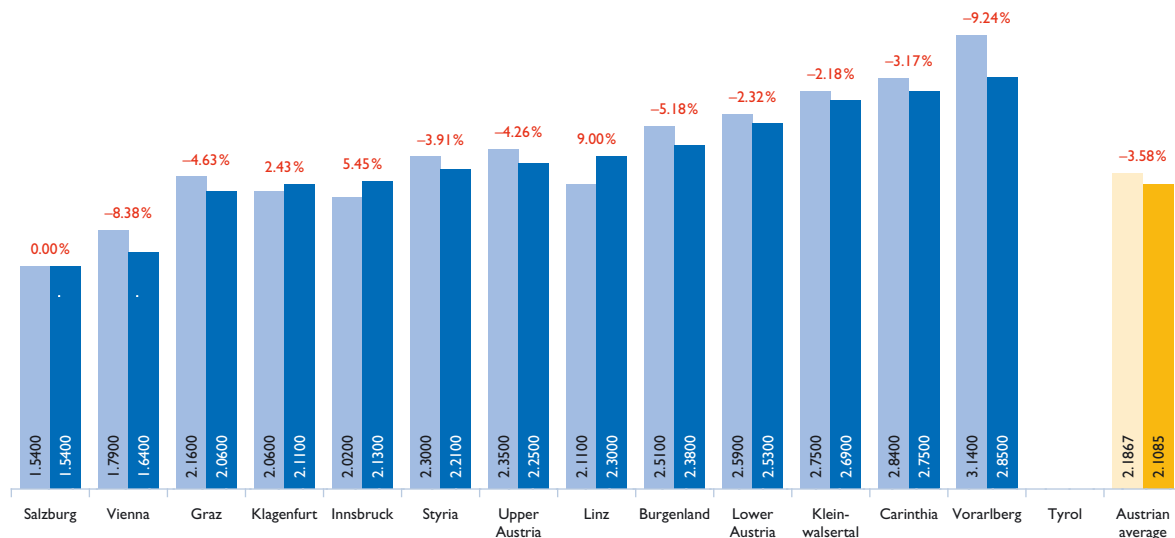
Source: E-Control

→ Use-of-system charges, Grid Level 7 (interruptible)

Chart 16

Night electricity only
Cent/KWh

■ SNT-VO as of 1 Jan. 2006
■ SNT-VO as of 1 Jan. 2007



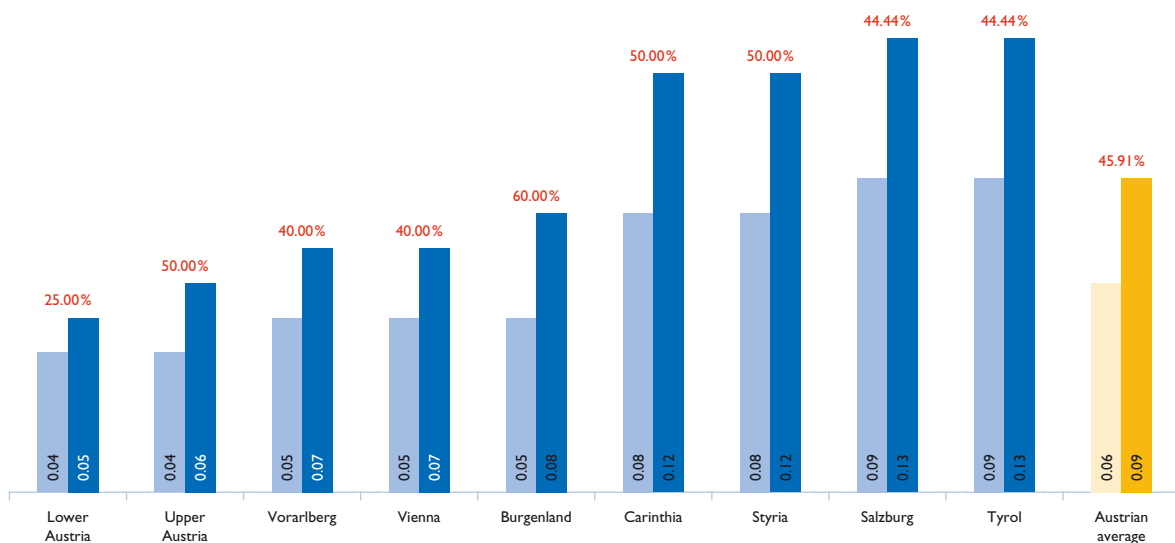
Source: E-Control

→ System-loss charges, Grid Level 3

Chart 17

Cent/KWh

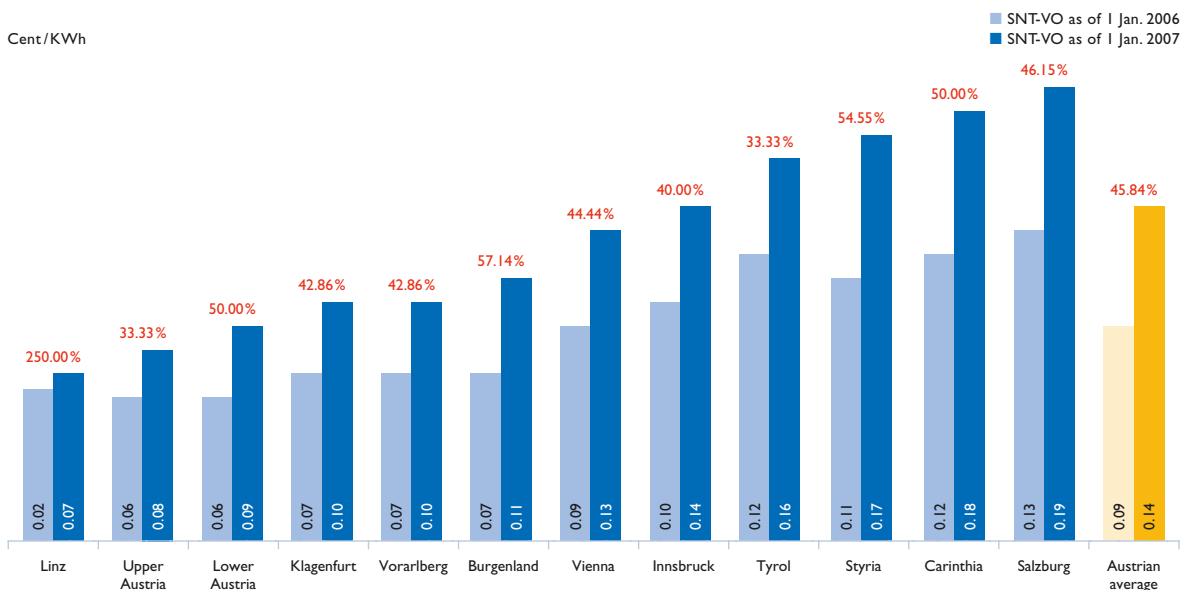
■ SNT-VO as of 1 Jan. 2006
■ SNT-VO as of 1 Jan. 2007



Source: E-Control

→ System-loss charges, Grid Level 4

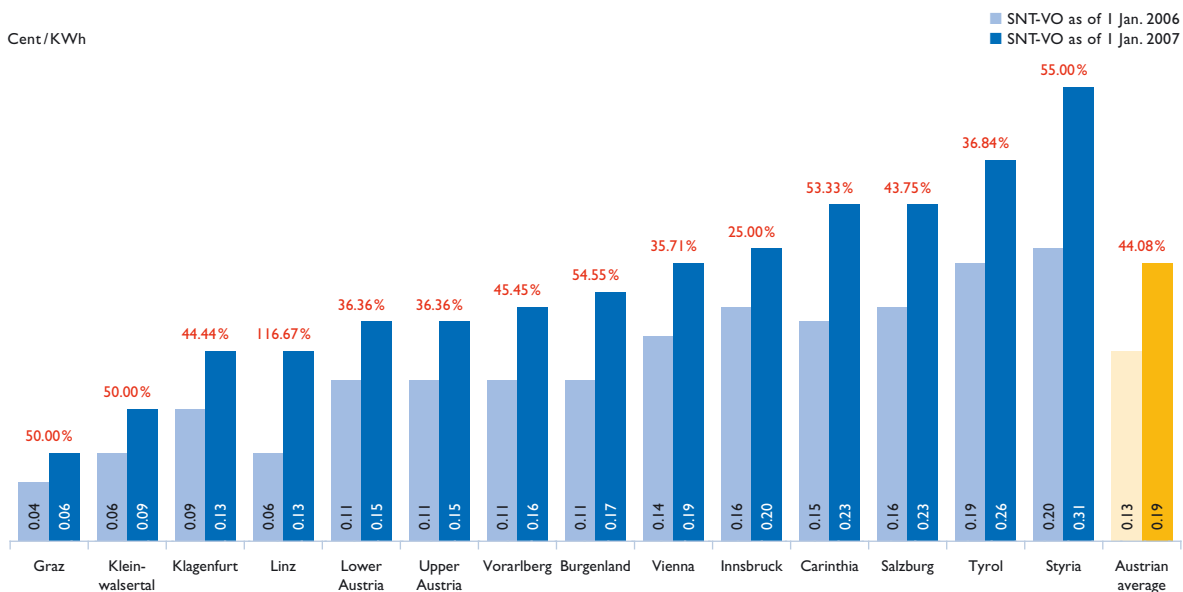
Chart 18



Source: E-Control

→ System-loss charges, Grid Level 5

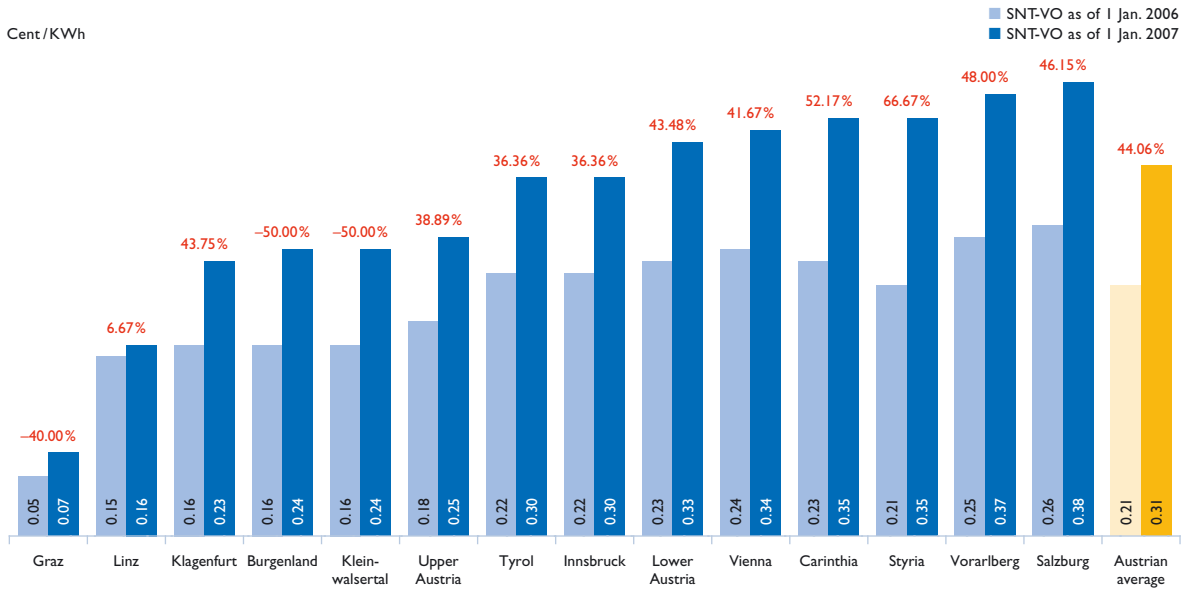
Chart 19



Source: E-Control

→ System-loss charges, Grid Level 6

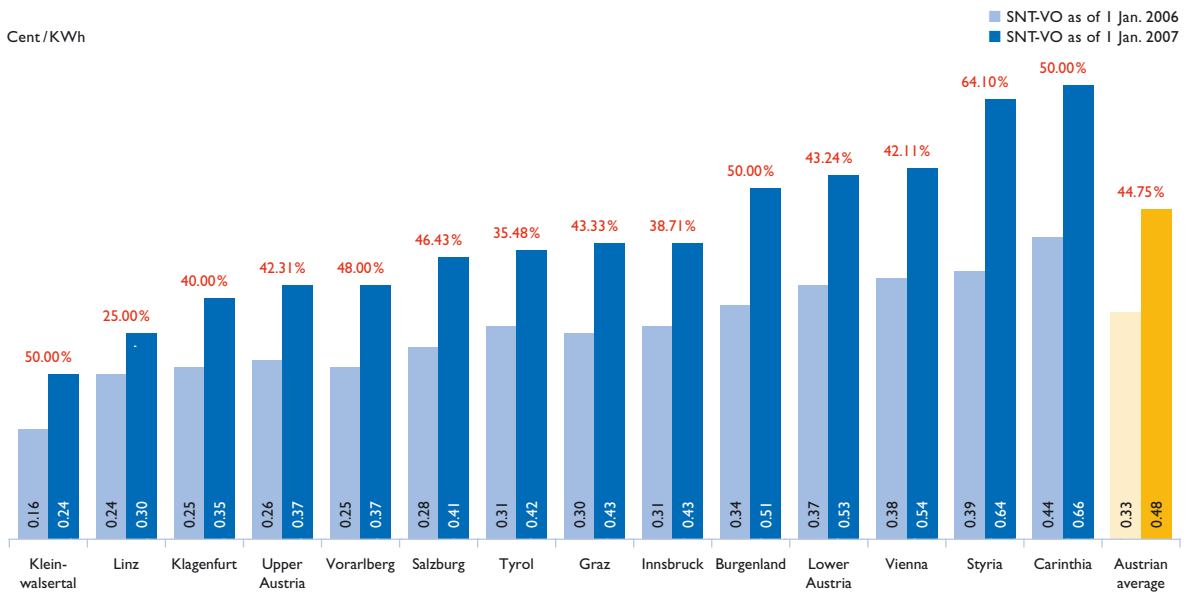
Chart 20



Source: E-Control

→ System-loss charges, Grid Level 7

Chart 21



Source: E-Control

→ Evolution of system charges since 2001

Table 6

Tarif adjustment per grid zone	SNT-VO 30 Sep. 2001 – 1 Jan. 2003		SNT-VO 1 Jan. 2003 – 1 Nov. 2003/ 1 Jan. 2004		SNT-VO 1 Feb. 2005 – 1 Apr. 2005/ 1 June 2005		SNT-VO 1 Jan. 2006		SNT-VO 1 Jan. 2007		Total (base year 2005)	
	EUR m	in %	EUR m	in %	EUR m	in %	EUR m	in %	EUR m	in %	EUR m	in %
Burgenland	-14.6	-15.6%	-3.9	-5.5%	-12.5	-18.9%	-2.4	-4.4%	-0.9	-1.6%	-31.6	-36.9%
Carinthia	0.0	0.0%	0.1	0.1%	-15.6	-12.8%	-1.4	-1.3%	1.4	1.2%	-16.1	-12.6%
Klagenfurt	0.5	2.5%	-1.4	-6.4%	-2.5	-11.5%	-0.4	-2.1%	0.9	4.7%	-2.9	-12.8%
Lower Austria	-10.8	-4.1%	-14.2	-5.6%	-20.1	-8.1%	-5.6	-2.5%	1.9	0.8%	-50.9	-18.1%
Upper Austria	-12.4	-5.3%	-9.6	-4.3%	-23.6	-10.7%	-3.9	-2.0%	-5.0	-2.5%	-58.3	-22.7%
Linz	-4.2	-5.1%	-2.7	-3.1%	-11.0	-12.6%	-2.4	-3.2%	-0.6	-0.8%	-22.0	-23.1%
Salzburg	-40.6	-20.0%	-8.4	-6.0%	-15.2	-10.9%	-5.9	-4.8%	-3.4	-2.9%	-58.9	-33.3%
Styria	-39.0	-15.1%	-9.9	-3.4%	-40.5	-14.2%	-10.0	-4.1%	1.6	0.7%	-111.2	-31.4%
Graz	-6.0	-12.9%	-3.4	-8.0%	-4.8	-12.2%	-1.6	-4.6%	-0.6	-1.9%	-17.5	-34.9%
Tyrol	-3.6	-2.4%	-8.1	-5.4%	-11.7	-7.8%	-8.5	-6.2%	3.2	2.3%	-31.2	-18.0%
Innsbruck	-0.2	-0.6%	-1.3	-4.3%	-2.1	-7.3%	-1.0	-3.9%	2.1	7.3%	-2.1	-6.9%
Vorarlberg	-1.8	-2.2%	-0.6	-0.8%	-6.9	-9.0%	-1.0	-1.5%	2.1	2.8%	-8.8	-10.3%
Vienna	-26.9	-7.7%	-16.1	-4.7%	-29.2	-8.9%	-5.0	-1.7%	-1.2	-0.4%	-84.6	-21.8%
Kleinwalsertal	0.0	0.0%	-0.0	-1.5%	-0.1	-4.9%	0.0	1.1%	-0.0	-0.7%	-0.1	-5.9%
Total Austria	-159.6	-8.0%	-79.2	-4.3%	-195.8	-10.8%	-49.1	-3.0%	1.6	0.1%	-496.5	-23.3%

Source: E-Control

Table 6 summarises the outcomes of the post-liberalisation tariff adjustments (use of system and system-loss charges, taken together) to date.

→ Cross-border exchanges

Compensation payments for transits

A common mechanism for payments between transmission-system operators (TSOs) to compensate them for the cost of transit flows has been in place in the European Union since 2002. This system is known as the “Inter TSO Compensation Mechanism”. The method used to determine the compensation payments to be made by and to TSOs remained unchanged from 2005. The details of the mechanism are established by bilateral contracts between TSOs which are renegotiated on an annual basis.

The Regulation on conditions of access to the network for cross-border exchanges in electricity (Regulation [EC] no 1228/2003), which entered into effect in June 2003, provides for the adoption by the Commission of guidelines specifying the details of the compensation mechanism. However, these guidelines, which were to have put the compensation mechanism on a legal basis in place of the bilateral contracts, have yet to be issued.

Changes in cross-border capacity allocation

The methods of allocating capacity at Austria’s borders remained largely unchanged in 2006. Bilaterally coordinated explicit auctions are held on the Czech and Hungarian borders. The regulators reached a joint decision overturning a long-term capacity reservation on the border

between the Czech Republic and Austria. Appeals are pending in both countries.

Since Slovenia enjoys derogation from the obligation to allocate capacity by means of market-based methods up to July 2007, only half of the available capacity at this frontier is allocated by the Austrian control-area manager. Daily auctions have been held since the spring of 2006. The same applies to the Italian border. It was not possible to agree a common allocation method with Italy for 2006, because of the differences between the Austrian and Italian systems. Because of this, the available capacity was equally divided between the two countries. The Austrian share of the capacity was allocated by the control-area manager under an existing long-term reservation. Since the spring of 2006 it has been possible to auction any free capacity on a daily basis. Joint allocation of the entire available capacity has been agreed for 2007.

In January 2006 Switzerland declared congestion status on the interconnector with Austria, though there was no congestion on the Austrian side. Daily and monthly explicit auctions have been held since then. An annual auction of 2007 capacity has also been held.

→ The Technical and Organisational Rules for System Operators and Users (TOR)

The ongoing development of the Technical and Organisational Rules for System Operators and Users (TOR) is performed by E-Control in cooperation with the system operators. The latter are entitled to make recommendations to E-Control for amendments to the rules in the light of experience of day-to-day operations and disruptions.

Part A and sections D2 and D4 were revised in 2006, and the amended versions are posted on our website.

The TOR draw on the standards and national grid codes of other European system operators, as well as the UCTE rules and philosophy, and are tailored to the special features of the Austrian electricity sector. They have grown out of the need to adapt the rules governing the operation and maintenance of Austrian electricity networks to the new legal framework without compromising security of supply.

Another objective of the TOR is that of safeguarding the continued interoperability of generation plant, transmission and distribution systems, and system users' installations.

The TOR are based on the principle of system users' accountability, and set out to avoid discrimination between users. This is achieved by basing the rules solely on objective criteria relating to the secure supply of all customers, reasonable quality standards and the avoidance of unacceptable repercussions on other users. The yardstick for the success of these arrangements is the maintenance of the standards of safety and reliability hitherto achieved by the European interconnected system including the Austrian interconnected generating stations, and transmission and distribution systems as a result of the common efforts of all UCTE members.

→ Unbundling report

Legal basis

Directive 2003/54/EC contains requirements with regard to functional, accounting and legal unbundling.

Functional unbundling

System operation must be independent of the other activities of vertically integrated undertakings in terms of organisation and decision making. The directive sets minimum standards for the protection of the ability of management

to act independently, for the actual decision-making rights of the system operator and for the adoption of a compliance programme.

Accounting unbundling

Electricity undertakings are required, in their internal accounting, to keep separate accounts for their transmission and distribution activities as they would be required to do if the activities in question were carried out by separate undertakings, with a view to avoiding discrimination, cross-subsidisation and distortion of competition.

Legal unbundling

System operators must be independent in terms of their legal form from other activities not relating to system operation. The directive does not create an obligation to separate the ownership of transmission or distribution system assets from the vertically integrated undertaking, i.e. to carry out asset unbundling. System operators need not necessarily be the owners of the systems.

The Austrian legislation transposing the directive provides for the legal unbundling of distribution-system operators with more than 100,000 connected customers. This threshold results in legal unbundling obligations for 11 distribution-system operators. Two businesses operate their distribution and transmission systems as a single entity, and are organised as public limited companies. Nine have opted for the private limited company form for their distribution-system operation activities. Of these, four are combined operators with both electricity and gas networks.

As regards the monitoring of unbundling compliance, there is institutional duplication, in that both provincial governments and E-Control are responsible. Under the Energy Regulatory Authorities Act, BGBl. No. 121/2000 we have comprehensive monitoring responsibilities, which are not restricted to accounting unbundling.

E-Control report on unbundling compliance by Austrian electricity system operators

Annex I of the report of the parliamentary economics committee on the draft government bill amending the Electricity Industry and Organisation Act 2004, 415 BlgNR XXII. GP, contains a motion calling on the Minister of Economics and Labour to forward a report by E-Control on the effectiveness of implementation of the directive as of 31 December 2005 to the National Council not later than 1 June 2006.

In order to obtain information for this report, in March 2006 we requested the distribution-system operators subject to legal unbundling obligations to provide documentation on the independence of their managements and the commercial independence of their companies.

E-Control analysed the papers sent in response and compiled a “Report on the status of implementation of the unbundling of Austrian electricity system operators” completed in May 2006. This is posted on the E-Control website.

The main findings of the report are:

- a) Scant financial resources available to system operators, and limits on the economic independence of decision makers

The “effective decision-making rights” demanded by the Commission’s interpreting notes for Directive 2003/54/EC were only achieved by the roundabout means of complicated legal devices in the form of limitations on the duty of the managers of the private limited company to obey instructions. There are tight restrictions on managers’ ability to take business decisions on investments, and on their financing to the extent that this goes beyond the approved budget. The form of the public limited company provided for by Austrian law, which would to a large extent guarantee the system operators’ independence, has only been chosen by distribution-sys-

tem operators that run these activities together with a transmission system, for which a public limited company is a legal requirement. All the other companies have founded private limited companies – a legal form that significantly restricts the subsidiary's economic independence.

b) Inadequate human resources of system operators

With few exceptions the system operators have somewhere between a handful of staff and 50 employees, whereas in the past the parent companies had workforces of up to a thousand assigned to system operation. In some cases the only employees are the directors, and all the other staff are on secondment. This places considerable limits on the legal and economic availability of human resources.

c) Few services provided by the system operators themselves

Not only do the system operators have few staff but the main assets required to operate the network (the infrastructure) generally remain with the parents, and are leased to the operators. The human resources required to operate the network and most of the common services are bought-in from other group companies under service agreements.

d) No sign of any intention to create a separate corporate identity in system operators' external communications

The company names of the system operators are mostly those of the parents with the word Netz (network) added. With few exceptions the employees of system operators and those of the parent companies work at the same headquarters building with the same registered address. Telephone numbers and e-mail addresses are in some cases identical, and the website is barely distinguishable from that of the parent.

e) Discriminatory treatment of other suppliers

Research conducted as part of the industry investigation carried out in conjunction with the Federal Competition Authority showed that there are a number of practices and forms of behaviour that create barriers to final consumers' gaining the benefits of liberalisation. Such barriers take the form of discriminatory treatment of other suppliers (sending the "captive" retailer's supply agreement at the same time as the system access agreement, giving the captive access to all customer data etc.)

f) Opaque pricing and lack of information on unbundling

Quotations are only provided in the form of all-inclusive prices covering the system charges, the energy price, taxes and levies, so that customers have little or no chance of comparing the energy price alone with other offers. An attempt to compare prices for a domestic consumer on the basis of the information available on websites revealed that only one company in western Austria stated the energy price alone, in cent/kWh, enabling unsophisticated consumers to make quick price comparisons.

A representative survey of consumers' understanding of unbundling found that only just under one-third of the sample were aware that the power supplier and the provider of the network services were different firms.

g) All-inclusive prices preventing reductions in system charges from being passed on

A study of practices with regard to all-inclusive pricing showed that reductions in system charges ordered by the Energy Control Commission were often accompanied by simultaneous increases in energy prices, meaning that the all-in price remained the same while the energy component grew.

→ Oversight of control-area managers

Monitoring of the control-area managers' activities focused on the allocation of cross-border capacity and congestion management costs. Due to the changed legal framework for capacity allocation (section 19 Electricity Industry and Organisation Act, and the Congestion Management Guidelines) there is a need for further adjustments to capacity allocation practices on Austria's borders. This relates to long-term reservations, and to the coordination and efficiency of the allocation methods. In particular, the ERGEG Regional Initiative is working towards coordinated capacity allocation.

We monitored congestion management in the Verbund APG control area on a quarterly basis to assist the Energy Control Commission with the system charges tariff determination pro-

cedure. Congestion management by the control-area manager is necessary because the North-South links in the Eastern control-area transmission grid do not have sufficient capacity to carry the amount of electricity required by the south of the country reliably under normal market conditions. The measures taken (generation- and transmission-side management) and the resultant costs were evaluated.

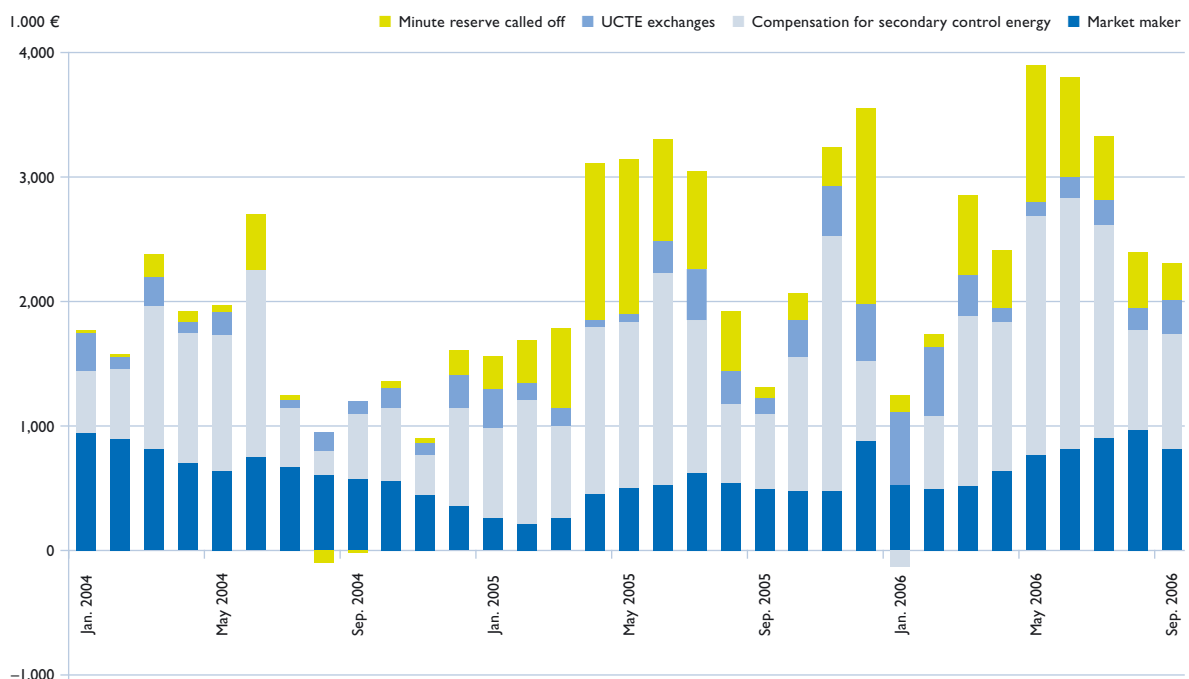
→ Balancing market

There were no significant changes in the balancing market arrangements in 2006. Total balancing costs increased, partly as a result of the higher energy price level (Chart 22).

E-Control and the market participants are keeping the effects of the balancing-power pricing system in the APG control area, introduced

→ Monthly balancing power costs

Chart 22



Source: APCS

during the summer of 2005, under constant observation. The evidence to date is that the system is sending the right price signals. So far, the settlement system and the related information on schedule deviations in the control area have not revealed any changes in the amount of balancing power. Less than 20% of the balancing power is billed to the balancing groups as a cost block.

In 2006 the main focus of regulatory activity was on discussions regarding the manner in which secondary control is performed. A study on potential alternatives is currently being prepared. The cost of the current system is being compared with foreign control areas, the technical effects of changes in generating stations' role assessed, and possible competitive scenarios mapped out. The study is expected to be completed during the early months of 2007.

→ Statistical activities

The Energy Regulatory Authorities Act and the Electricity Industry and Organisation Act transferred responsibility for statistical surveys and other electricity related statistical work to E-Control.

The scope of E-Control's statistical duties is established by the Ministry of Economics and Labour Electricity Elektrizitätsstatistik-Verordnung 2001 (Statistics Order 2001), BGBl. II No. 486/2001.

E-Control fulfils its statutory mandate by collecting, processing, validating, evaluating, analysing and publishing data.

The information is posted on our website, and every effort is made to publish both the monthly and the annual results as quickly as possible.

→ Security of supply

Emergency intervention duties

In June 2006 the Energy Intervention Powers Act 1982, BGBl. No. 545/1982 was amended by BGBl. No. 106/2006 (Article 4 of the Energy Security of Supply Act 2006). The main changes are an overhaul of the measures and responsibilities for natural gas supply security, as well as the assumption by E-Control of responsibility for monitoring security of supply with respect to the two network energy forms, electricity and natural gas. Related to these developments is a shake-up of data collection for intervention purposes. E-Control is now empowered "to require, by order, the reporting of historical, current and projected data at periodic intervals, even if the contingencies set out in section 1(1) do not apply, in order to draw up intervention measures to safeguard supplies of electrical energy, and to monitor security of supply in the electricity sector."

This means that data collection for intervention purposes will no longer be largely limited to historical time series, but will also extend to current operational data and forecasts.

Arrangements for surveys for intervention purposes were already made by the E-Control Energielenkungsdaten-Verordnung 2002/03 (Energy Intervention Data Order 2002/03). However, the Order does not cover all of the new aspects of E-Control's statistical work introduced by the Energy Intervention Powers (Amendment) Act. Moreover, some of the survey topics had long been in need of revision, in terms of more precise definitions, adjustment or a need to bring the legislation into line with practice. A third aspect, which also implies a realignment of

at least some survey topics, is the reassessment of all areas of crisis management. For these reasons a new Electricity Intervention Data Order was enacted on 21 December 2006.

A major change made by the Order is a reduction in the amount of detail required; the data need now only be disaggregated to a level relevant to operational practice.

The Order also reflects the conclusion, reached in discussions and studies, that it is vital for all the data streams required in a crisis to be clearly predefined and to have been tested for their feasibility. This is also essential because in situations calling for emergency intervention measures there is no time to set up new information streams or processes in order to assess the position and the action to be taken, or to monitor the effects of that action.

A new area of data collection for intervention purposes introduced by the Order is that of identifying contact persons whose name and telephone number, and function (as the person responsible for statistics or action on intervention measures) have been recorded.

The information to be surveyed under the Electricity Intervention Data Order 2006 represents the minimum required by E-Control and the control-area managers to perform their monitoring functions, and by the Minister of Economics and Labour to take decisions on emergency measures in consultation with the Main Committee of the National Council. It is also the minimum needed by E-Control and the control-area managers, and the other market participants charged with the coordination and implementation of intervention measures in a crisis.

Austrian failure and outage statistics for 2005

E-Control constantly monitors and rates security of supply and supply quality in Austria. Maintaining supply security and quality is one of the central tasks of a regulator. Since 2002 we have been carrying out statistical surveys designed to assist in safeguarding electricity supply reliability – which is an aspect of supply security.

The latest survey, pursuant to the Statistics Order, was conducted in cooperation with the system operators and the Association of Austrian Electricity Companies.

As in the previous two years, the 2005 survey achieved 100% coverage, i.e. it included all the Austrian system operators.

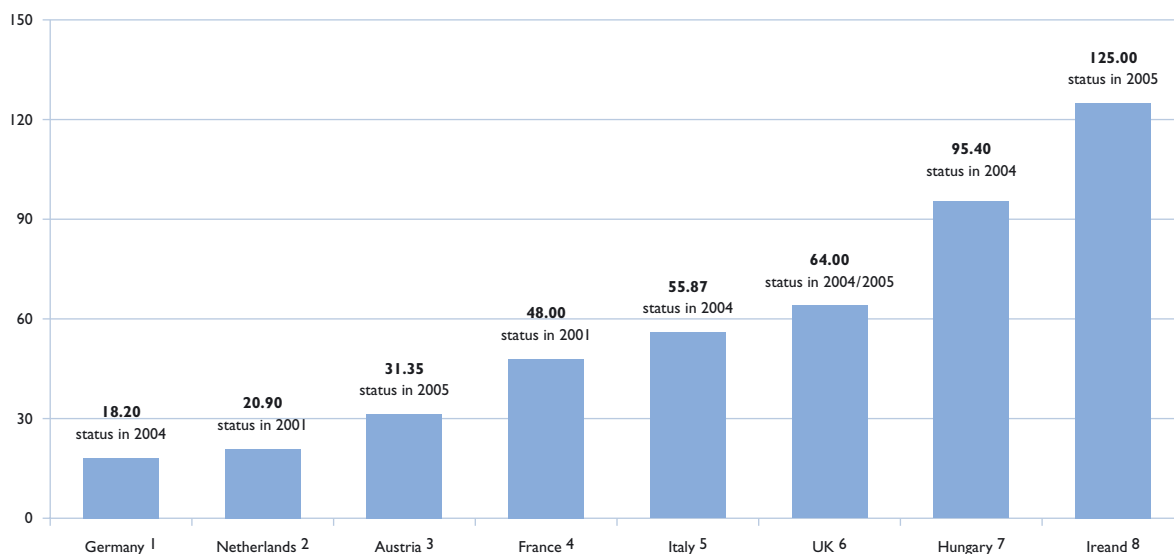
Electricity supply reliability is determined, among other factors, by the condition of the distribution networks. The age of the networks and the quality of the maintenance performed by the operators has a significant influence. In 2005 mean non-availability (the average duration of scheduled and unscheduled supply interruptions) per connected load was 52.3 minutes/year. This was roughly the same as in 2003 and 2004. Comparison of non-availability with system availability over the year shows the availability ratio to have been 99.99% in 2005, as in the previous three years.

Mean non-availability arising from unscheduled interruptions, e.g. outages caused by snow or lightning, was 31.35 mins/y in 2005 (Chart 23). Annual variations in unscheduled non-availability are partly explained by atmospheric influences (e.g. the frequency of lightning, snow and storms), longer supply restoration times, and measures

→ Annual “unplanned” non-availability of electricity supply on medium-voltage networks in selected European countries

Chart 23

Non-availability (minutes per year)



1 2004, stochastic non-availability;

2, 4 Status 2001, unplanned minutes lost per customer per year, Medium Voltage;

3 2005, non-availability relative to voltage;

5, 7 Status 2004, unplanned minutes lost per customer excluding exceptional events;

6 Status 1 Apr. 2004 to 31 Mar. 2005, CML, Voltage level 1–22kV, OFGEM, Electricity Distribution Quality of Service Report 2004/05

8 Status 2004, SAIDI;

Source: VDN availability statistics for 2004

Source: Second Benchmarking Report on Quality of Electricity Supply, Sept. 2003

Source: E-Control, 2006

Source: CEER, Third Benchmarking Report on Quality of Electricity Supply 2005

Source: CER, Decision Paper on Distribution Operator Revenues – 2005

taken to improve reliability, such as maintenance and investment in system upgrading.

The survey results show little change in non-availability from previous years. It should be noted that supply interruptions due to natural disasters, such as the flooding in 2005, are not included in the national statistics.

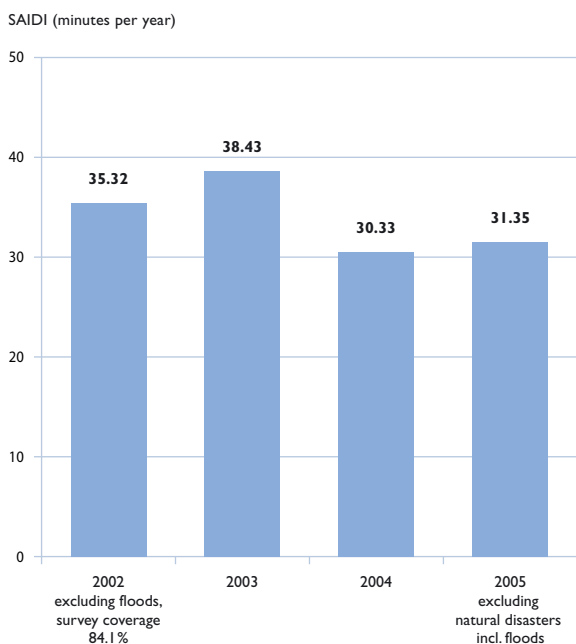
Chart 23 shows that supply reliability in Austria compares very well with the rest of Europe,

and that Austria is one of the countries with the fewest electricity supply interruptions.

Chart 24 shows the annual “unplanned” non-availability of electricity supply in Austria over the 2002–2005 period. It should be noted that the effects of the floods in 2002 were not included in these calculations, and the survey that year only encompassed 84.1% of customers supplied. The disasters of 2005 were likewise excluded.

→ Annual “unplanned” non-availability of electricity supply in 2002, 2003, 2004 and 2005

Chart 24



Source: E-Control

Feasibility study on a nationwide power quality (PQ) monitoring system

A study by the Graz University of Technology, commissioned by E-Control, examined the feasibility of long-term nationwide monitoring of power quality (PQ).

Like any other product, electricity must meet certain minimum quality standards. There are different ways of referring to the quality of power supplies with different meanings, according to the perspective taken. Thus supply security and power quality together add up to the supply quality of a grid.

When investigating the causes of inadequate power quality, a number of areas need to be taken into account. In the first place, disturbances caused by customer equipment can cause voltage distortions and flicker. The influence of this interference on power quality varies from node to node, and generally increases with the distance from the power injection point, i.e. as the short-circuit capacity decreases. This means that apart from the effects at the interference source the extent of the propagation of the interference in the system can be of great significance.

Secondly, poor power quality on upstream or parallel grids can cause disturbances, and the reliability of generating capacity can play a role in power quality.

Power quality is an important element of supply quality, which also has supply reliability, operational security and commercial quality aspects.

Where problems arise with customer equipment which may be due to poor power quality this must be checked by taking measurements. Permanent measuring permits long-term monitoring of power quality and any trends. Nationwide permanent measurements would yield parameters that could be used to benchmark the power quality of given networks.

With a view to testing power quality throughout Austria, the feasibility study identified metering points on the medium-voltage grids that would minimise the expense (number of instruments) whilst yielding a maximum of useful information. For economic reasons, among others, it is important to keep the number of measuring stations and installation sites to a minimum. Redundant measurement results and information losses must be avoided wherever possible. The study is posted on the E-Control website.

→ Stranded costs

Commission decision SG (2001) D/290567 of 25 July 2001 permitted the payment of state aids to Austrian generators to compensate them for stranded costs. The decision distinguishes between two eligibility categories – support for the Voitsberg III brown-coal power station and for domestic hydro generating stations.

The recognised stranded costs incurred by the Voitsberg III brown coal generating station total €132.61m. Section 13 Energy Regulatory Authorities Act assigns responsibility for collecting, administering and disbursing the stranded costs contributions to E-Control.

The funding mode for the period from 19 February 1999 to 30 September 2001 under the first Stranded Costs Order, BGBl. II No. 52/1999 differed from that under the amended order, BGBl. II No. 354/2001 covering the period from 1 October 2001 to 30 June 2006.

The total stranded costs contributions payable up to 30 June 2006 under the second order amounted to €89.25m.

In all, €130m have been disbursed to the beneficiaries. As there are a number of pending cases before the courts of ordinary jurisdiction and the Constitutional Court and Administrative Court of Appeal, E-Control has been obliged to delay disbursement of the remainder. Any residual amounts in excess of this are returned to the system operators.

→ Arbitration proceedings heard by the Energy Control Commission

In 2006 a total of 17 arbitration applications were made to the Energy Control Commission under section 21(2) Electricity Industry and Organisation Act. In terms of the issues involved the arbitration proceedings can be broken down

into three groups. Most concerned claims for the repayment of stranded-costs contributions. The Commission also dealt with matters relating to allocation to given grid levels and took decisions on the charging-on of consumption levies.

→ Oversight of green electricity and CHP

Section 25 Green Electricity Act requires E-Control to submit annual reports to the Minister of Economics and Labour reviewing attainment of the objectives of the Act and changes that have taken place as compared to previous years. These reports may include recommendations for improving or adjusting the support mechanisms and other arrangements provided for by the Act. The 2006 E-Control green-power report is available for download from our website (www.e-control.at) and can also be requested in printed form (e-mail to: christina.grabner@e-control.at).

Some of the recommendations of the 2005 green-power report were implemented by the Green Electricity (Amendment) Act 2006, namely:

- Restriction of financial support for biomass-fired electricity generating stations even if they use most of the waste heat;
- Support for hydro power (new stations with capacities of between 10–20 MW) when this is necessary for their economic operation;
- An administrable spending cap for new renewable generating stations.

The recommendations made by the 2006 green-power report include:

- Monitoring of the effects of the Green Electricity (Amendment) Act 2006 and an overall evaluation after two to three years;
- Action to improve energy efficiency such as interval metering and improved consumer information (automatic meter-reading systems);
- Setting of research and development priorities coordinated with European programmes, as available technologies do not permit sufficient low-carbon energy supplies.

Apart from preparing this comprehensive report we carried out the following activities:

- Preparation of expert opinions during the consultations on the Green Electricity (Amendment) Act 2006;
- Preparation of an expert opinion in conjunction with the Austrian Energy Agency during the consultations on the Green Electricity Order 2006;
- Preparation of reports on green electricity funding (2007 settlement prices);
- Preparation of reports on the allocation of the injection compensation quotas to new renewable generating station operators (pro rata expenses for balancing power and administrative overheads);
- Preparation of reports on the expenses of green-power balancing-group representatives;
- Preparation of a report on power labelling in connection with E-Control's oversight of the system;
- Development of an interactive efficiency calculator in cooperation with the Austrian Energy Agency; this allows visitors to the E-Control website to assess their electricity consumption and provides energy saving advice.

Fossil-fuel-fired CHP

Since 2003 the annual procedure for support payments to CHP stations under the Green Electricity Act has been as follows:

1. CHP station operators submit support applications to the Ministry of Economics and Labour by 31 December of the previous year.
2. The Ministry commissions experts at E-Control with checking whether the applications meet the conditions for support under sections 12 and 13 Green Electricity Act.
3. On the basis of the experts' reports the Ministry issues a notice on the preliminary CHP support tariff for the calendar year in question.
4. At the end of the year the operators must commission reports from independent experts or auditors evidencing the fulfilment or otherwise of the support conditions, and additional expense on the basis of actual output, costs and revenues.
5. On the basis of these reports the Ministry issues a notice setting the definitive CHP support tariff.

In 2003 the statutory maximum CHP support rates of 1.5 cent/kWh and 1.25 cent/kWh were reduced by 35% to 0.95 cent/kWh and 0.705 cent/kWh, and as a result only €56.9m of the €75.7m of CHP contributions collected were disbursed.

In 2004 the statutory CHP support rates were cut by 70% to 0.448 cent/kWh and 0.198 cent/kWh, respectively, such that only €24.8m of the €77.8m of CHP contributions collected were paid out.

The Green Electricity Act 2006 was amended in April 2006. A new transitional provision, section 30c, amending section 13 (3–4), was included. This provides for the reopening of the 2003 and 2004 procedures under section 69 AVG (General Administrative Procedure Act) at the request of any party thereto, and for the application of CHP support tariffs of 1.5 or 1.25 cent/kWh irrespective of the market price. This will mean that the remaining surpluses from 2003 (€18.7m) and 2004 (€53m) are entirely disbursed.

Under sections 12 and 13 Green Electricity Act, from 2005 onwards the level of the CHP support tariff is determined by the evidenced additional expense arising from the operation of CHP stations. This necessitated an audit of the unavoidable costs involved in continuing to operate a CHP plant, and of the revenues required to do

→ CHP support payments, 2003–2006 (as at 31 May 2006)

Table 7

	2003	2004	2005	2006
Number of CHP support applications (CHP plants)	48 (53)	39 (44)	36 (41)	37 (40)
Para. 3 CHP energy in GWh	5,404	5,791	5,889	4,972
Para. 4 CHP energy in GWh	764	733	811	1,206
Total CHP energy (paras. 3 & 4) in GWh¹	6,169	6,524	6,701	6,181³
CHP surcharge in cent/kWh	0.15	0.15	0.13	0.07
CHP support payments in EUR m	75.7	77.8	67.5	8.6 ⁴
Support payments disbursed in EUR m	56.9	24.8	38.2	0
Surplus in EUR m²	18.7	53.0	29.3	8.6

¹ Figures for 2005 and 2006 are preliminary.

² All figures are preliminary as either legal proceedings are pending or final figures are not yet available.

³ Corresponds to the amounts stated in the applications.

⁴ By May €8.6m in CHP supporting funding had been collected; by the end of the year the amount will have risen to €37.5m.

Source: E-Control

so. In the absence of a clear definition in the Act of the costs and revenues eligible for recognition as a basis for CHP support, in 2005 some companies lodged an appeal against the Ministry of Economics and Labour's preliminary notices in the Administrative Court of Appeal. These proceedings are still pending.

In 2006 the 0.13 cent/kWh maximum CHP surcharge provided for by section 13 (10) Green Electricity Act was reduced for the first time, to 0.07 cent/kWh.

Despite a decline in the number of applications for CHP subsidies, the total amount of CHP energy for which support was requested rose between 2003 and 2006. The drop in the number of applications (some small CHP stations ceased applying after 2003) was more than offset by an overall increase in generation at CHP plants due to rising market electricity prices.

The Green Electricity (Amendment) Act adopted in April 2006 brings the following changes:

1. Section 12 (5) raises the CHP support tariff in order to generate €60m in funding for investment grants to new CHP stations (30% of which is earmarked for industrial CHP plants) during the 2006–2012 period, in addition to the payments for existing and modernised capacity.
2. Section 13 (12) introduces a standardised method for calculating the electricity revenues in the meaning of section 13 (1) on the basis of the EEX futures prices.
3. Under section 12 (3) in conjunction with section 13 (5), support for existing capacity is to continue until 31 December 2008, that for modernised plants until 31 December 2010, and that for new stations until 30 September 2012.
4. Section 13 (2) establishes a clear efficiency yardstick for eligibility of 0.6, applicable from 2005 onwards.
5. Section 13 (10) caps the funding for CHP support payments generated by the lump-sum metering-point charge at €54.5m in 2007 and 2008, and at €28m in 2009 and 2010.

6. Section 12 (4) in conjunction with section 42b Electricity Industry and Organisation Act as amended by BGBl. I No. 106/2006 provides for the introduction of guarantees of origin for high efficiency co-generation under EU Directive 2004/8/EC.

→ **Energy efficiency calculator**

Consumers need information if they are to exploit the energy-saving opportunities open to them. E-Control has developed an energy efficiency calculator in cooperation with the Austrian Energy Agency. This enables consumers to perform “quick checks” and more detailed analyses of the energy saving potential in their homes (Chart 25).

The “quick check” is an online tool that provides consumers with the following information:

- **Energy-saving potential:** Apart from a comparison with average consumption, the energy-saving potential per type of use (e. g. refrigeration) in kWh is indicated. The potential savings are priced at the local supplier’s rates, so that the annual saving is calculated in euro as well as kWh.

- **Energy-saving tips for all forms of consumption:** Users are given hints about simple ways of saving energy by changing one’s behaviour, as well as advice on what to look out for when buying appliances.

For consumers who are about to make purchasing decisions, there is also a link to a page (www.topprodukte.at) maintained by the Austrian Energy Agency, which provides information on the most energy-efficient products per category, including descriptions and prices.

→ **“Quick check” with the E-Control Energy-efficiency calculator**

Chart 25



→ Market-abuse proceedings

E-Control's market monitoring and oversight responsibilities include acting to prevent discriminatory treatment of market participants – particularly by monopolists (system operators). If E-Control detects abuse it is required to take all necessary steps to restore compliance with the law without delay.

In 2006 we conducted a total of 21 abuse proceedings. Most were instigated by consumers' suppliers or consumers themselves. Some irregularities became known to us through our arbitration role, meaning that abuse proceedings were initiated in addition to arbitration hearings. Examples of the matters involved were: the alleged retroactive billing of additional expenses arising from green electricity; letters to customers from a system operator about outstanding system charges (which had been paid by the energy supplier in this case); billing of consumption levies only to customers who had switched; bills which failed to state meter readings and did not give the full metering-point code; failure to offset charges for certain installations in accordance with the Systemnutzungstarife-Verordnung (System Charges Order); a request for payment of a deposit based on general terms and conditions dating back to 1969; refusal to disclose the net

energy price in response to telephone inquiries; liability for cable-laying costs; practices with regard to energy price increases; and itemisation of the use-of-system charge.

In one matter involving a large number of customer installations, oral proceedings were held at our offices in order to clarify issues in face-to-face discussions with the companies concerned. During such proceedings we investigate whether the system operator concerned has observed the statutory requirements and the market rules, and has refrained from discriminatory behaviour. If an abuse is detected the company in question is required to desist from this behaviour immediately, under a staged procedure (restraining order followed by a notice of restraint). In 2006 it was not necessary to issue any notices in order to restore compliance. In some cases it became apparent during the proceedings that no abuse had taken place. Where abuse had occurred, it proved possible to halt it during the proceedings, thereby rapidly re-establishing compliance.

In many cases, on learning of malpractice E-Control staff have been able to deal quickly with grey areas regarding the applicability of legal provisions without initiating proceedings, thus enabling market participants to achieve compliance.



→ **Inter-TSO Compensation (ITC) Mechanism**

The current EU-wide mechanism for compensating transmission-system operators (TSOs) for costs incurred as a result of transit flows is based on bilateral agreements. When this system was introduced in 2002 there was a general understanding that it was only a transitional solution. The Regulation on conditions of access to the network for cross-border exchanges in electricity (Regulation [EC] no 1228/2003) created a legal basis for the adoption of guidelines for a single long-term mechanism.

In 2005 the Commission charged ERGEG with drawing up proposals for guidelines which would establish the method for calculating the compensation payments. ERGEG set up a task force for this purpose, which has been closely analysing and evaluating a variety of models over the past two years. In April 2006 ERGEG carried out a public consultation during which all interested parties had an opportunity to comment on the proposed guidelines. However, despite intensive efforts ERGEG was unable to make any recommendations to the Commission.

→ **ERGEG Electricity Regional Initiative (ERI)**

At a meeting of the Florence Forum in 2004, chaired by the European Commission and attended by representatives of EU member states, the European regulators and stakeholders reached the conclusion that interim steps towards the creation of regional markets would be an efficient means of promoting the development a single European electricity market. Thereafter the first round of regional “mini-fora” was held; this was devoted to cross-border congestion management. ERGEG then mounted a public consultation on the development of regional electricity markets and the road map for achieving this goal. A large number of proposals were received, and were reflected in an ERGEG position paper.

Building on this work, ERGEG unveiled the Electricity Regional Initiative (ERI) in February 2007. The ERI is a Europe-wide process aimed at the systematic development of regional markets. It is a practical and achievable way of delivering market integration and step-wise progress towards a single European market. The starting point was the definition of seven market regions (Chart 26) for the ERI.

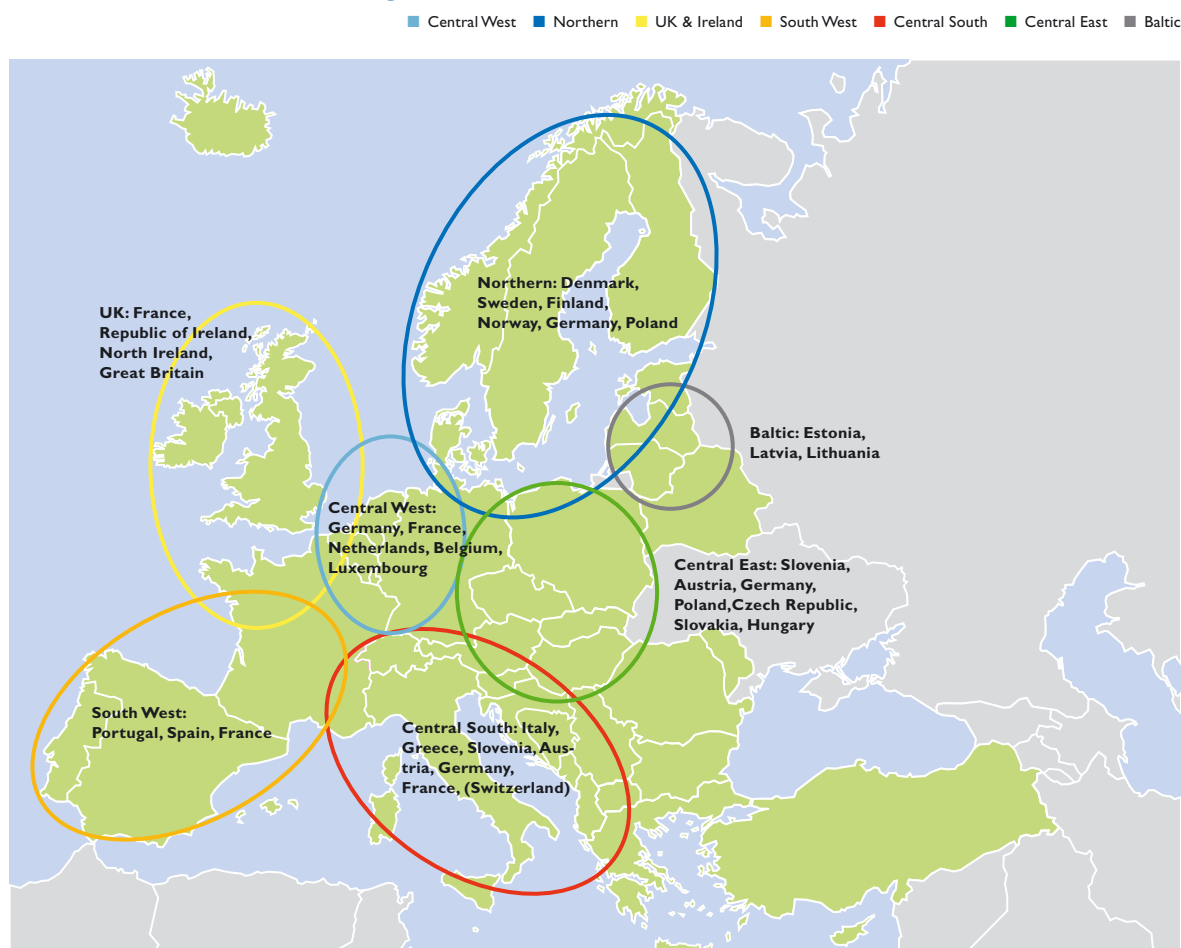
Austria forms part of the Central Eastern Europe (CEE) region which also comprises the Czech Republic, Germany, Hungary, Poland, Slovakia and Slovenia, and of the Central Southern Europe (CSE) region, to which France, Germany, Greece, Italy and Slovenia also belong. E-Control has been invited to act as lead regulator in the CEE region.

The intention is for each region to identify specific impediments to market integration and make practical improvements that will contribute to removing them. The ERI will enable a wide range of companies and organisations to participate. EU member states and the European Commission are supporting the process. Transmission-system operators and other market participants are directly involved through implementation and stakeholder groups. Public information on the initiative is posted on the ERGEG website, lending a high degree of transparency to the process.

The two regions in which Austria is represented have set similar priorities. The main issues that the CEE region will set out to tackle are congestion management, market transparency, market entry barriers and regulators’ responsibilities. As part of action on cross-border congestion management, the control-area managers involved have launched a project designed to enhance the efficiency of cross-border trade. This is aimed at fully coordinated allocation of cross-border capacity in the region. The work on transparency has included comparing the current situation with the ERGEG good-practice guidelines and making initial improvements to data disclosure.

→ The seven ERI market regions

Chart 26



Source: ERGEG

The lead regulator for the CSE region is Italy's AEEG. The key issues being addressed by the region are likewise cross-border congestion management, transparency and regulatory powers.

The Electricity Regional Initiative will continue in 2007. The main focus will be on implementation of the initial findings and overarching coordination of activities in the regions.

→ Transparency

Transparency is crucial to the establishment of a functioning wholesale market. Varying access to essential information is an entry barrier and increases the risk for market participants that do not possess sufficient information. This additional risk is ultimately reflected in higher prices for final consumers. ERGEG therefore drew up

Guidelines of Good Practice on Information Management and Transparency (GGP-IMT) during the first half of 2006, with assistance from E-Control. The guidelines were the subject of a public consultation process, and market participants' opinions were also sought at a public hearing. Opinions differed – particularly with regard to the degree of detail required for generation data. The final version of the GGP-IMT, taking the views expressed into account, was adopted in the summer of 2006.

The proposals establish a consistent approach to the minimum transparency requirements in respect of the provision of information on load, transmission and access to interconnectors, generation, balancing energy and wholesale markets. The Congestion Management Guidelines have already created some disclosure obligations governed by European legislation. Since ERGEG regards the maximum possible harmonisation of information disclosure practices as necessary for the formation of larger market regions, it has proposed to the European Commission that a uniform legal basis for market transparency be established on the basis of the ERGEG GGP-IMT. ERGEG advocates an approach whereby information that has been published in one sub-market of the European Union must be released everywhere else (best practice).

→ Integration of balancing markets

Although balancing markets only trade small amounts of power they are a key element in efficient electricity markets. Properly functioning balancing markets also make a crucial contribution to security of supply.

Since these markets are currently confined to very narrow areas and are highly concentrated as a result, ERGEG developed Guidelines of

Good Practice for Electricity Balancing Markets Integration in 2006. The guidelines were subjected to a public consultation process, and market participants' views reflected in a revised version. The document is intended as a first step towards increased integration of balancing markets. The consultation identified security of supply, competition, efficiency and transparency as central requirements that balancing markets should fulfil. The guidelines do not yet cover intra-day markets and automatically activated power reserves (e.g. secondary control). ERGEG will be developing further proposals on balancing power in the course of 2007.

→ Congestion Management Guidelines amending the annex to Regulation (EC) No 1228/2006

Following intensive preparatory work ERGEG forwarded proposed Congestion Management Guidelines amending the annex to Regulation (EC) No 1228/2006 to the European Commission in 2005. The Commission initiated a comitology process in member states at the start of 2006 in order to open the way for adoption of the guidelines. Austria was represented by the Ministry of Economics and Labour, and E-Control was involved, inter alia, in answering questions on technical issues.

The guidelines were adopted by the Commission in the spring of 2006, and came into force on 1 December 2006. They govern matters including the procedures for the allocation of cross-border capacity, the identification of available capacity and coordination between transmission-system operators. They are intended to lead to market-based allocation procedures (auctions) resulting in close regional coordination, thereby increasing the competitiveness and efficiency of the wholesale markets.



Developments on
the gas market 2006

ANNUAL
REPORT



→ **Developments on the Austrian gas market**

A total of approx. 9.1 billion (bn) normal cubic metres or 100.4 TWh of natural gas were supplied to final consumers in the 2005 calendar year – an increase of 5.7% on 2004. For statistical purposes, final consumers are all consumers withdrawing natural gas from the grid to meet their own needs, meaning that they comprise households, businesses and power stations.

During the first three quarters of 2006, final consumers were supplied with 66.5 TWh or 6.0 bcm gas – a year-on-year decline of 1.8 TWh (approx. 0.2 bcm) or 2.7%. The only unusually high growth rate was recorded in January, while there were sharp falls in May, June and September.

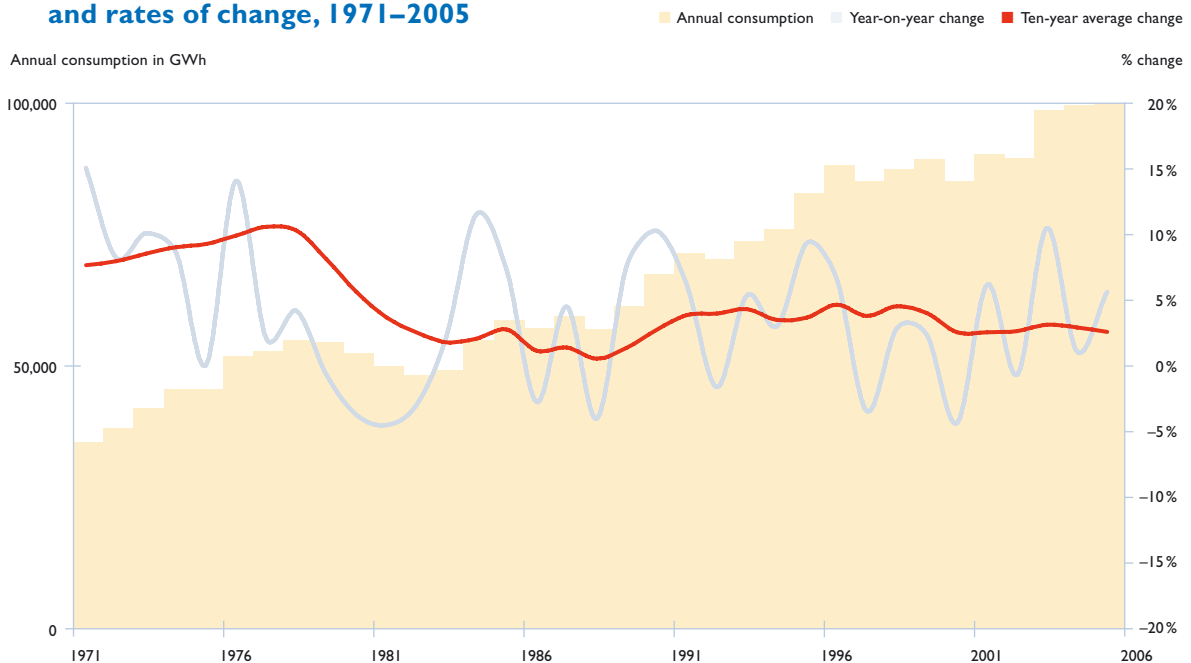
Underlying demand, adjusted for power station offtake and weather-related variations, was down in the first nine months of the 2006 calendar year.

A drop in domestic demand of approx. 1.8 TWh was accompanied by a narrowing of 2 TWh in the import balance and a gain of 0.6 TWh in domestic supply. Salient features of the year were year-on-year increases of 1.5 TWh in domestic production and 0.9 TWh in net injection into storage. Meanwhile imports were up by 0.9 TWh and exports by 2.9 TWh.

This meant that as of the end of September 2006 the volume in storage was 6.5 TWh (0.6 bcm) higher, at 33.9 TWh (3.1 bcm), boosting the percentage full to 100%. This was the highest level since liberalisation in October 2002.

→ **Natural-gas supply, domestic gas consumption and rates of change, 1971–2005**

Chart 27



Source: E-Control

→ Price trends in 2006

Import price trends

The continuing rise in crude oil prices since October 2004 was reflected in gas import prices (Chart 28). The estimated prices are derived from a number of oil price indices, and are updated on a monthly basis.

The downturn on the International Petroleum Exchange (IPE) points to a coming decline in Austrian gas import prices, and we now expect the price to stand at about €18.99/MWh in July 2007. The Title Transfer Facility (TTF) is a virtual trading point on the Dutch grid for which spot prices are quoted. TTF spot prices have also been trending down.

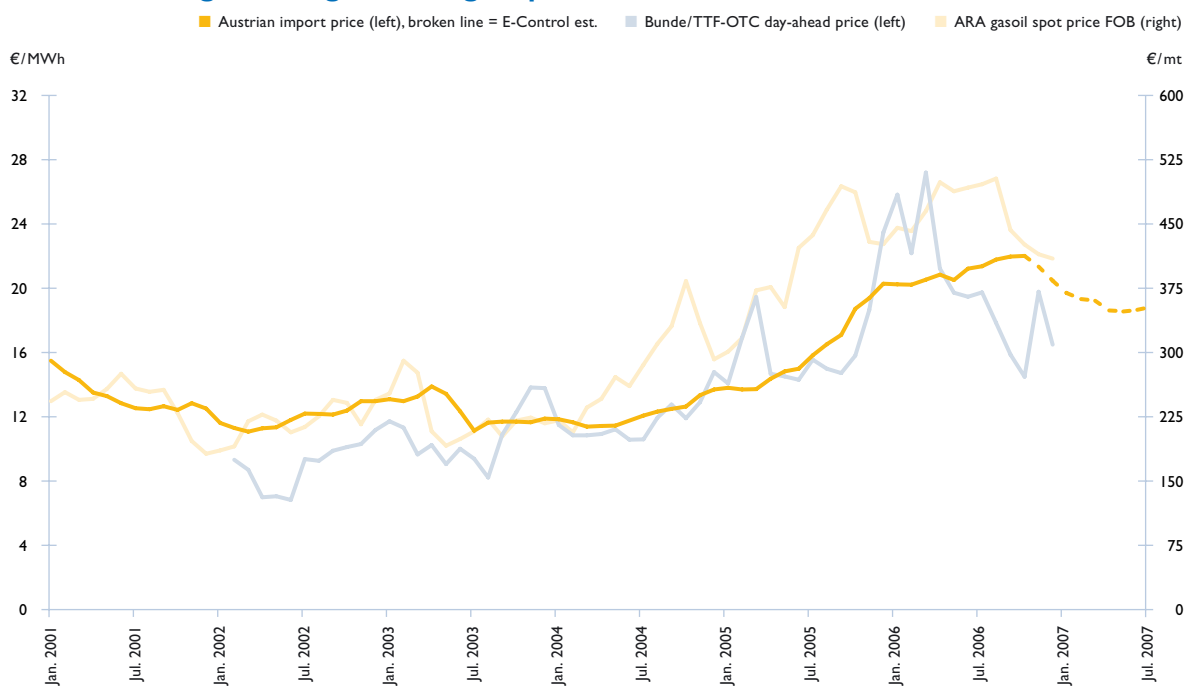
Domestic price trends

A comparison of the price components (energy price, system charges, taxes and levies) paid by a typical domestic consumer (supplied by the local player) in Lower Austria in December 2006 with December 2005 (Chart 29) shows that the energy-price increase on 1 December 2006 raised the energy component to over 50% of the total. The reduction in system charges as of 1 January 2007 will accentuate this shift.

Despite the cut in system charges, households' overall gas bills are up because of the energy price increases imposed by some suppliers. Chart 30 shows the current total current spending on gas (euro/year) of an average domestic consumer in various grid areas.

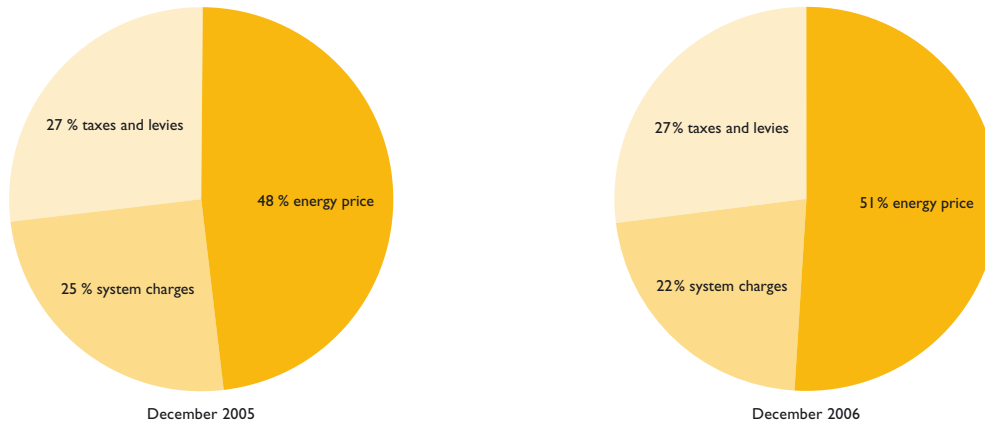
→ Wholesale gas and light heating oil prices

Chart 28



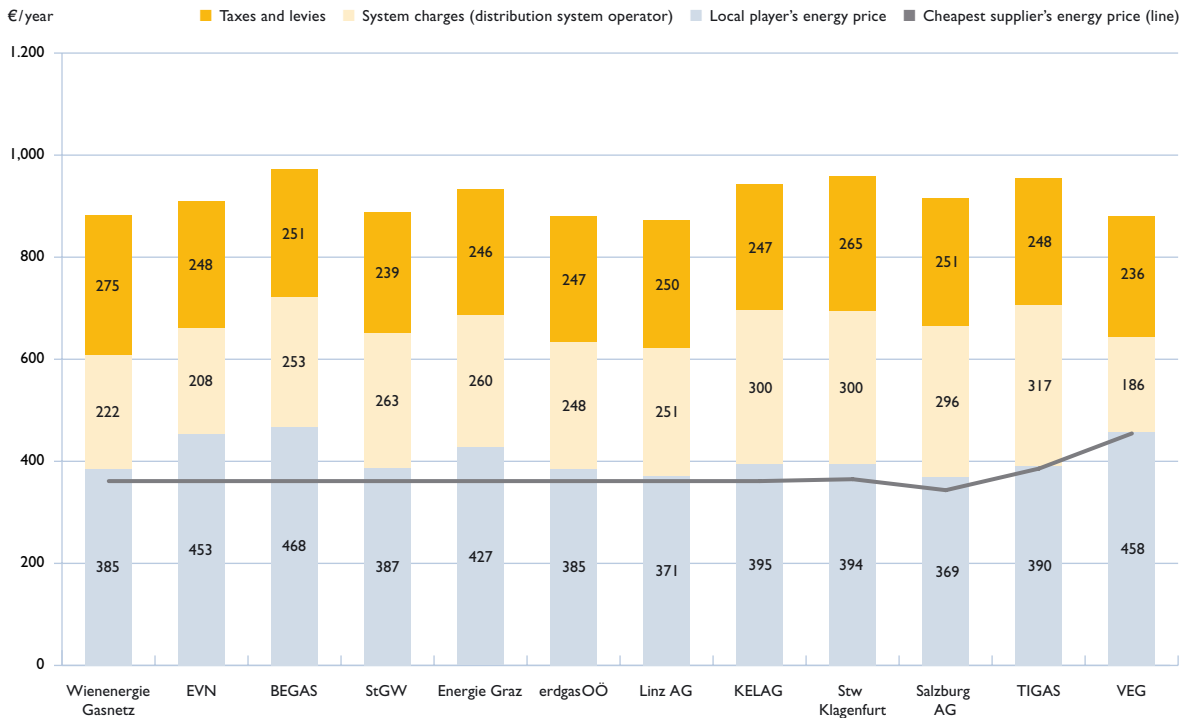
Sources: Statistik Austria and Energate

→ **Total natural-gas expenditure of an average domestic consumer in Lower Austria (local player), comparison between December 2006 and December 2005** Chart 29



Source: E-Control

→ **Overall natural-gas price comparison, average small-scale consumers with an annual consumption of 15,000 kWh, by grid areas** Chart 30



Source: E-Control, status December 2006

Industrial price trends

E-Control conducts industrial price surveys pursuant to section 9(1)(3) Energy Regulatory Authorities Act, which requires it to prepare and publish retail electricity and natural-gas price comparisons. These benefit industrial companies in that the studies are anonymous, and enable them to compare the prices they pay with prevailing rates for consumers with similar demand patterns. The surveys also generate other information on the terms of supply agreements of potential use to consumers in future negotiations.

For its part, E-Control profits from its statutory price-reporting duties by gaining an insight into

the presentation of billing information, and is in a position to initiate abuse proceedings if the need arises. The price surveys give us a standardised source for use in supplying data to national (Ministry of Economics and Labour and Statistics Austria) and international (Eurostat) statistical institutions.

In order to minimise the workload for companies the January and July surveys take different forms. The July survey relates only to energy prices while the January questionnaire asks about other matters, including energy-supply agreements.

The survey of industrial prices in July 2006 was carried out between August and October 2006.

→ Results of the July 2006 and July 2005 industrial price surveys

Table 8

	Measure	July 2006 in Cent/kWh	July 2005 in Cent/kWh
Category A Annual consumption > 100,000,000 kWh	Arithmetical mean	2.23	1.69
	Standard deviation	0.26	0.24
	No. of companies	29	16
	Average contract term	–	35 months
Category B Annual consumption > 10,000,000 kWh < 100,000,000 kWh	Arithmetical mean	2.36	1.86
	Standard deviation	0.42	0.24
	No. of companies	56	54
	Average contract term	–	27 months
Category C Annual Consumption < 10,000,000 kWh	Arithmetical mean	2.54	1.84 ¹
	Standard deviation	0.48	0.36
	No. of companies	71	46
	Average contract term	–	36 months
Total	Arithmetic mean	2.42	1.83
	Standard deviation	0.44	0.30
	Total Median	2.39	1.83
	First quartile	2.23	1.64
	Third quartile	2.58	2.00
	No. of companies	156	116
	Average contract term	–	32 months

¹ The reduction in the average price in July 2005 from that in January 2005 is explained by the fact that the January survey responses were only recomputed on a random sample basis, using copies of invoices, and corrected where necessary. In July 2005 all the data was validated in order to improve its quality.

For detailed information on the industrial price surveys conducted to date visit: www.e-control.at/Gas/Gaspreise/Endverbraucherpreise/Industriegaspreise (detailed analyses in German only).

Source: E-Control

The median and the first and third quartiles were calculated for the entire study. The median – the middle value in an ascending order of averages – for the entire sample was 2.39 cent/kWh (Table 8). The first and third quartiles reveal that 75% of all consumers were paying over 2.23 cent/kWh, and 25% more than 2.58 cent/kWh. The spread of quartile values shows that the difference between the median and the upper quartile

is greater than that between the median and the lower quartile. For consumers this means that it is relatively difficult to find a price significantly lower than the median (2.39 cent/kWh), and some must pay considerably higher prices.

The year-on-year comparison reveals an increase of about 32.24% in average energy prices, which is partly attributable to higher crude oil prices.



→ **Network regulation:
tariff determination**

**Gas System Charges (Amendment)
Order 2006 of 1 April 2006**

On 1 April 2006 the Energy Control Commission enacted an amended Gas System Charges Order. Previously only distribution companies' charges for metering services had been capped. The amended Order introduced maximum prices for metering services at the transmission-system level.

**Gas System Charges Order 2006
(Amendment) Order of 1 January 2007**

In 2006 the Energy Control Commission enacted a second amended Gas System Charges Order, which came into force on 1 January 2007. This also necessitated amendments to the Gas-Regelzonenführer-Verordnung (Gas Control Area Managers Order) and the Fernleitungsanlagenverordnung (Transmission Systems Order).

The tariff changes reflected the findings of a cost review based on new data from the 2005 financial year. In addition, detailed provisions on tariff determination criteria were included in the order.

A significant change introduced during the cost review was a unification of pipeline depreciation periods and service lives. This has permitted the standardised allocation of investment costs to customers over time, and helped smooth out the ratcheting of tariffs due to investment cycles.

The depreciation periods were unified according to the pipe materials, in the light of technical reports and related accounting implications, as well as substitute competition from other primary energy sources.

The cost of capital is another key element in the determination of reasonable system charges. The cost of capital has a significant influence on companies' willingness to invest in gas transmission and distribution pipelines, and hence on security of supply. Only if system operators obtain reasonable returns will they maintain and expand network assets. The approach to the determination of adequate returns on capital was modernised.

The review findings resulted in an average reduction in system charges of about 4.5%, leading to total savings of €21m for consumers. The increase in the amount of gas supplied also reduced average unit cost.

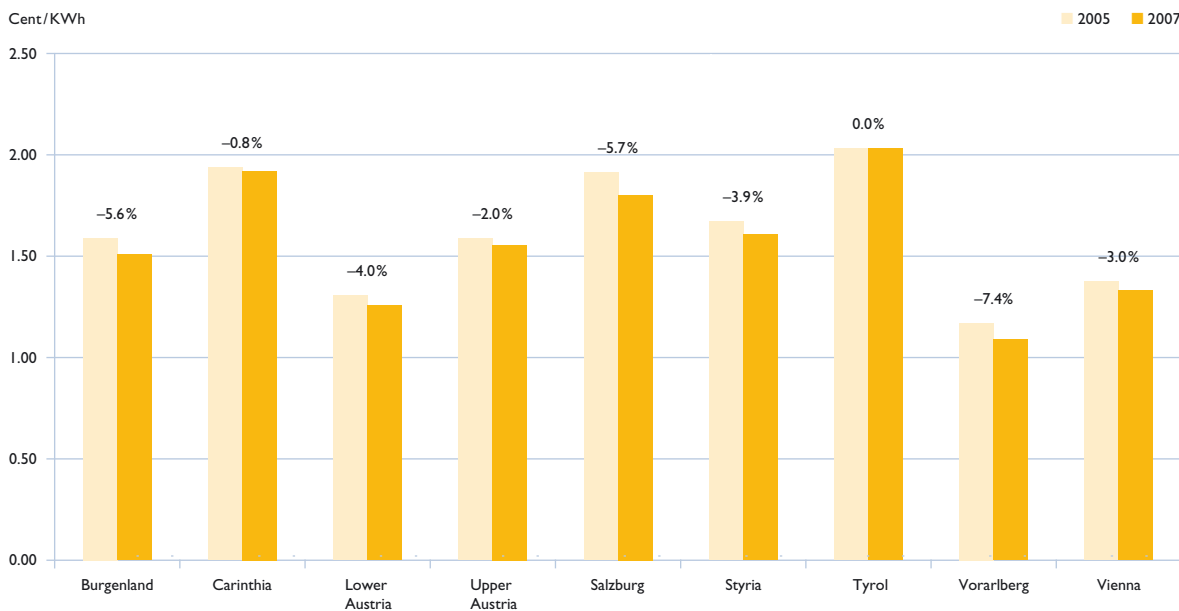
Charts 31 and 32 illustrate the outcomes, broken down by provinces, by taking the examples of two typical consumers:

- A household with an annual demand of 15,000 kWh, connected to Grid Level 3; and
- A small business consumer with an annual consumption of 90,000,000 kWh and 8,000 hours of use, at Grid Level 2.

The Energy Control Commission ordered the average tariff reductions shown in Charts 31 and 32 for consumers with these demand characteristics.

→ **Example 1: Household with an annual consumption of 15,000 kWh, Grid Level 3**

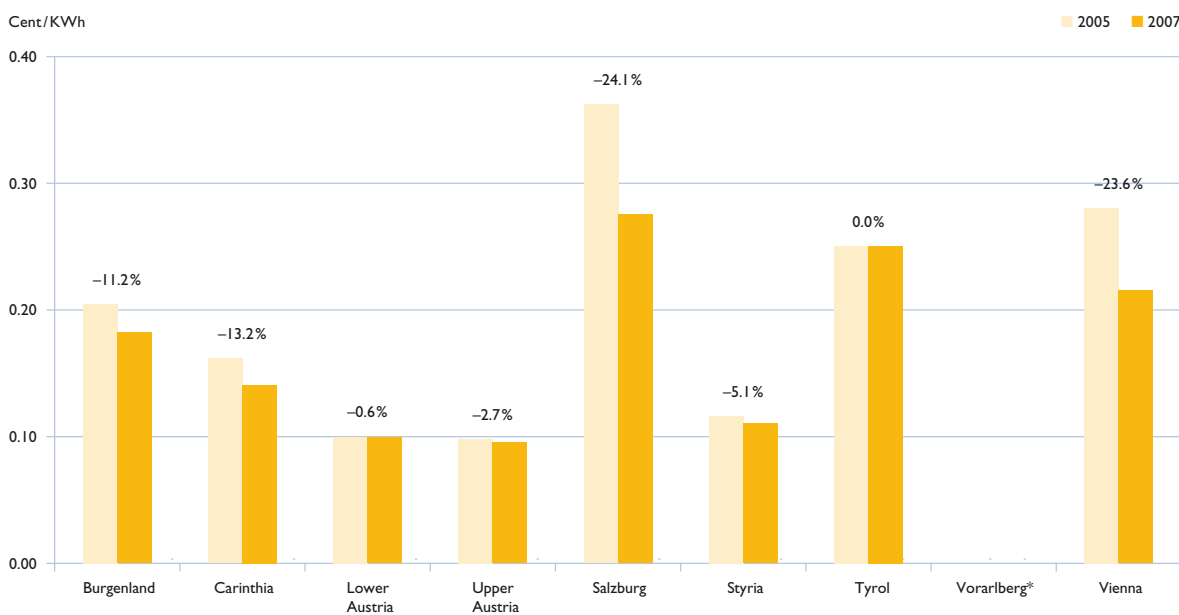
Chart 31



Source: E-Control; no change in 2006

→ **Example 2: Industrial consumer with an annual capacity of 90,000,000 kWh and 8,000 hours of use per year, Grid Level 2**

Chart 32



* NB: There are no Grid Level 2 consumers in Vorarlberg.

Source: E-Control

→ Cross-border exchanges (transits)

The second Natural Gas Directive (2003/55/EC) abolished the legal distinction between domestic transmission pipelines and transmission pipelines used for cross-border transportation (transit pipelines). Directive 2003/55/EC makes regulated access to transmission pipelines mandatory. Regulation (EC) No 1775/2005¹¹ fleshes out the details of implementation of the provisions of Directive 2003/55/EC relating to access to gas transmission pipelines.

The Natural Gas (Amendment) Act 2006¹² transposes the requirements of Directive 2003/55/EC and Regulation (EC) No 1775/2005 into national law. Henceforth access to Austrian transit pipelines must be in accordance with general terms and conditions, and tariff calculation methods approved by the Energy Control Commission. Transit companies are obliged to offer network access contracts to eligible applicants.

Gas is transported via Austria to downstream markets on the following transit systems (Chart 33):

- The southward Trans-Austria-Gasleitung (TAG);
- The westward West-Austria-Gasleitung (WAG);
- The northeastward March-Baumgarten-Gasleitung (MAB);
- The south-eastward Hungaria-Austria-Gasleitung (HAG);
- The westward Penta-West-Gasleitung (PW); and
- The southeastward Süd-Ost-Leitung (SOL).

OMV Gas GmbH has interests in all of the transit systems, and is the sole owner of the PW, MAB, HAG and SOL. The company holds 51% of the operator of the WAG, BOG GmbH, while

GdF owns 44% and E.ON Ruhrgas AG 5%. OMV Gas has an 11% stake in TAG GmbH, the majority shareholder being ENI with 89%. No information regarding the transportation rights on the transit systems is available.

Similarly to the system for domestic transportation, the Natural Gas (Amendment) Act 2006 provides for a “one-stop shop” for transits. OMV Gas plays a coordinating role in dealing with applications for network access where users require access to more than one transit system. The company must respond to network access applications within 14 days, disclose the available capacity on the desired transit route, compute the use of system charges and forward the contract documents to the applicants.

In the interests of more efficient utilisation of transit systems, the Austrian legislation follows explanatory notes to Regulation (EC) No 1775/2005 in obliging system users that fail to employ contracted capacity to offer it to other users on a secondary market (“use-it-or-sell-it” [UIOSI]). Under section 31e(7) Natural Gas (Amendment) Act this may only take place online, via the central trading platform set up by OMV Gas in January 2007. The UIOSI principle is followed by “use-it-or-lose-it” (UIOLI): if a system user fails to comply with the obligation to offer unused committed capacity on the trading platform the transmission company must then make this capacity available to third parties.

The hope is that the above principles and the creation of a secondary market in the form of a central trading platform will increase the liquidity of the capacity market. These provisions of the Act are of particular importance in the light of efforts to complete the European internal market in natural gas, and are intended to help avoid contractual congestion.

¹¹ Regulation (EC) No 1775/2005 of the European Parliament and of the Council of 28 September 2005 on conditions for access to the natural-gas transmission networks.
¹² Energy Security of Supply Act 2006, BGBl. I No. 106/2006

The Natural Gas (Amendment) Act 2006 requires that all gas transits from 1 January 2007 onwards be subject to general terms and conditions and tariff calculation methods approved by the Energy Control Commission. The transit charges calculated according to these approved methods must be cost reflective and non-discriminatory. The Act specifies that the cost basis to which such methods are applied shall be the full cost of system operation, combustion gas, linepack management, maintenance, upgrading and expansion, administration and capacity marketing. The return on capital employed must be reasonable in international terms, and must adequately reflect the risk borne by operators. The calculation methods must be such as to facilitate efficient gas trading and competition, avoid cross-subsidisation between system users and permit sufficient investment to maintain the viability of the systems concerned.

The tariff calculation methods must be modified or replaced if the Energy Control Commission's so requests. They must be approved if the transit charges resulting from them are not significantly above the average posted rates of comparable pipeline systems in the European Union. The transit companies must therefore submit tariff benchmarking studies to the Energy Control Commission together with the methods to be approved by it. They must post the tariff calculation methods on their websites.

Regulation (EC) No 1775/2005 imposes certain publication duties on transit companies. Since 1 July 2006 they have been required to publish detailed information regarding the capacity situation and the services they offer.

The move from negotiated to regulated access to transit systems represents a major step towards

→ Transit and transmission systems in Austria and interconnection points

Chart 33



a transparent, non-discriminatory market. However, the key issue in this respect is monitoring of compliance with the publication duties established by Regulation (EC) No 1775/2005.

Allocation of capacity on the TAG system

For some time now there has been a shortage of capacity on the TAG gas pipeline due to the growing demand for deliveries to Italy. The construction of an additional compressor station will increase capacity by 3.5 bcm/year in 2008. Towards the end of 2005, when assigning extra capacity created by a new compressor station, the operator TAG GmbH opted for pro rata allocation. Due to the large number of applications, far exceeding the number of gas wholesalers in the region (the capacity on offer was 160 times oversubscribed), strategic behaviour by some prospective customers cannot be excluded. Since only about 2,500 cu m/hour of capacity was distributed among some 150 applicants it would appear that heavy trading is taking place on the secondary market. TAG is expected to tighten the conditions for participation in the procedure for the planned second capacity allocation so as to remove the incentive to apply solely in order to trade on the secondary market.

Market study on WAG expansion scheme

In 2006 the sole owner of the transportation rights on the WAG, BOG GmbH, announced plans to expand the system's capacity in the westward direction of flow from Baumgarten to Oberkappel to approx. 1,420,000 cu m/h (0° C; 1.01325 bar) by 2011. The company is investigating the future demand for capacity, and has invited potential customers to indicate their requirements as part of a market study due for completion by the end of 2006.

→ Unbundling report

Legal basis

“Organisational” and “functional” unbundling is governed by section 7 (3) Natural Gas Act, BGBl. I No. 121/2000 as amended by BGBl. I No. 148/2002. One aspect of organisational unbundling is the preparation of a compliance programme under section 7(3)(c) Natural Gas Act.

This provision requires system operators to draw up compliance programmes stating what action is to be taken to prevent discriminatory behaviour. These programmes must set out the special duties of staff members with regard to equal treatment of customers. If a system operator belongs to an integrated gas company, the management of the parent must appoint a compliance officer responsible for drafting the programme, monitoring compliance with it and reporting to management. The compliance officer must submit annual reports to E-Control on the measures taken, which must be published.

Annual reports by E-Control on Austrian gas system operators' compliance programmes

To date the practice has been for E-Control to compile an overall report on all system operators' compliance programmes and post this on its website. The system operators are free to post their compliance programmes on their own websites as well.

As with the previous reporting period, which comprised the short 2003 period and the 2004 financial year, towards the end of the financial year (in October 2005) we wrote to the system operators to request submission of their annual reports under section 7(3) Natural Gas Act.

To assist in evaluating the compliance programmes, we enclosed the questionnaire used in the previous reporting period, which contained 22 questions on implementation of the compliance programme. We used the documentation sent in by the companies to draw up an overall report on “Austrian gas-system operators’ compliance programmes” which was posted on our website in August 2006.

The findings of the report can be summarised as follows:

- a) Organisational separation of system operation and competitive areas of business incomplete

The responses showed that the legal unbundling of integrated companies’ system operation and retail functions had been implemented to the extent prescribed by the law. However, at many companies there are still close ties between the monopoly and competitive areas of operations in organisational and personnel terms. Though in most cases they are not illegal, these links tend to restrict competition and endanger non-discriminatory treatment of market participants.

- b) Same people marketing energy and network services

After reviewing the documentation submitted in connection with compliance programmes and interviewing staff at all the large gas-system operators, the conclusion was reached that the organisation of the marketing of energy and network services is unsatisfactory with regard to non-discrimination.

Energy and network services marketing are organisationally or even legally unbundled at most companies, but in the vast majority of cases service contracts between the two result in the provision of both forms of services by the same staff members.

The compliance programmes all stress that the employees who sell domestic connections must remind customers that they are free to choose their suppliers – but since these salespersons are also responsible for energy marketing it would be surprising if they did not push their own company’s products first and foremost.

These structures, which may often be understandable in purely commercial terms, are thus associated with a considerable risk of disadvantaging alternative gas suppliers and obstructing competition.

- c) Room for improvement in the protection of sensitive data

Information gathered when preparing the report indicates that there is room for improvement in the protection of commercial data at many of the companies concerned. True, system operation and retailing are kept strictly separate in accounting terms – by means of company codes or a two-contract system – but hardly any companies run separate servers for the two areas. The reports have a lot to say about restrictions on access to data input by system operators, but not a single company submitted a written policy stating who is authorised to access what data. Moreover, although there are frequent

references to treating commercially sensitive data in confidence there are no responses that define precisely what data is regarded as sensitive in which business processes.

The general impression is that while the companies have given consideration to the various aspects of compliance, the use of access-management systems, and the documentation of restrictions are often seen as a low priority that can be left until last.

d) Itemisation of system charges and energy prices

The report notes that during the period under review many companies failed to itemise the components of the system charges on their bills as required by section 23 (6) Natural Gas Act. It will therefore be necessary in future to keep a particularly close watch on compliance with the additional obligation, under section 40 a (1) Natural Gas Act, to itemise the energy price (stated in cent/kWh), which came into force on 1 January 2007.

e) Procurement of intragroup services at normal market terms

At first sight, service procurement may not seem to be intimately connected with non-discrimination, but the manner in which a system operator purchases services from an integrated company says a lot about its independence.

Most of the companies subject to legal unbundling obligations have formed new private limited companies and transferred their gas system

operation activities to them, as is legally permissible. However some of these new system operation subsidiaries have very few staff, meaning that common services and – where the workforce remains with the parent company – technical services have to be bought-in from the parent. These contracts tend to be couched in very general terms with regard to the services rendered and the pricing, and in most cases lump sums are invoiced. One wonders whether such contracts would also have been concluded with non-Group companies.

Workshop on compliance programmes

An all-day workshop on “Compliance programmes in practice” was held at E-Control’s offices in November 2006, in response to requests from some companies, made during the interviews. The compliance officers of a pure-play gas system operator, and a combined gas and electricity system operator outlined the practical problems faced when implementing compliance programmes. The ensuing discussion largely focused on the areas singled out for criticism in the latest E-Control report on compliance programmes, namely, staff with dual network services and energy marketing roles, and the inadequate protection of sensitive data. In the absence of precise legislative provisions on the reporting deadlines we reached agreement with the companies that the next reports on compliance programmes were to be submitted to E-Control by March 2007 at the latest. The sample compliance programmes for integrated companies and legally unbundled entities were revised during the year, and the updated versions have been posted on the E-Control website.

→ **Revision of the market rules**

The market rules are the totality of the general terms and conditions that are subject to approval by E-Control or the Energy Control Commission, as well as the Other Market Rules, and the Switching and Standardised Load Profiles Orders (Chart 34).

Apart from minor adjustments the market rules were last revised in 2003. Due to the changed legal framework created by the Natural Gas (Amendment) Act and the need for other modifications, a project aimed at revising the market rules was launched in May 2006. The schedule is shown in Chart 35.

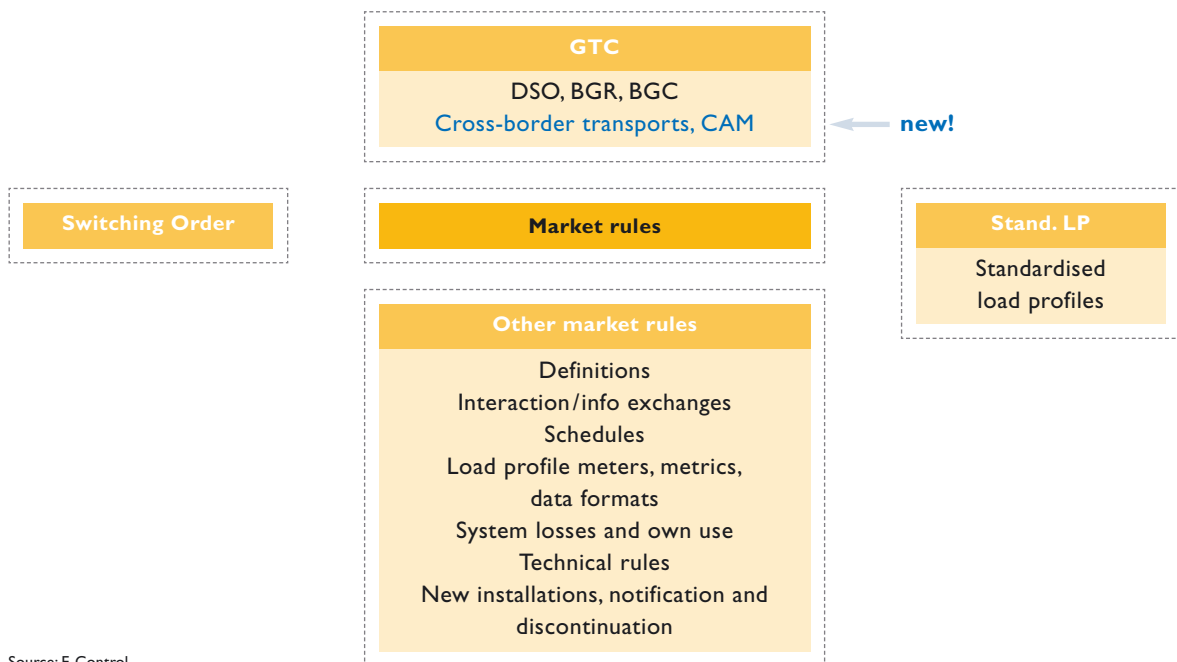
Additions to the previous market rules are the General Terms and Conditions of Cross-Border Transportation, and the General Terms and Con-

ditions of Control-Area Managers, for which recommended versions were agreed with market participants for the first time.

The subject matter was divided among six working groups, and two rounds of meetings were held. Drafts were sent to the working groups before each round of meetings, and formed the basis of the discussions. Market participants were involved in the project – mainly through their interest groups and associations. Special meetings were also held on selected topics. After a total of about 20 meetings the market rules were approved at a joint wrap-up workshop. With the exception of a few points which some companies wished to examine internally before submission of their general terms and conditions, consensus was reached on the recommended texts. The new market rules came into force on 1 January 2007.

→ **Overview of the gas market rules**

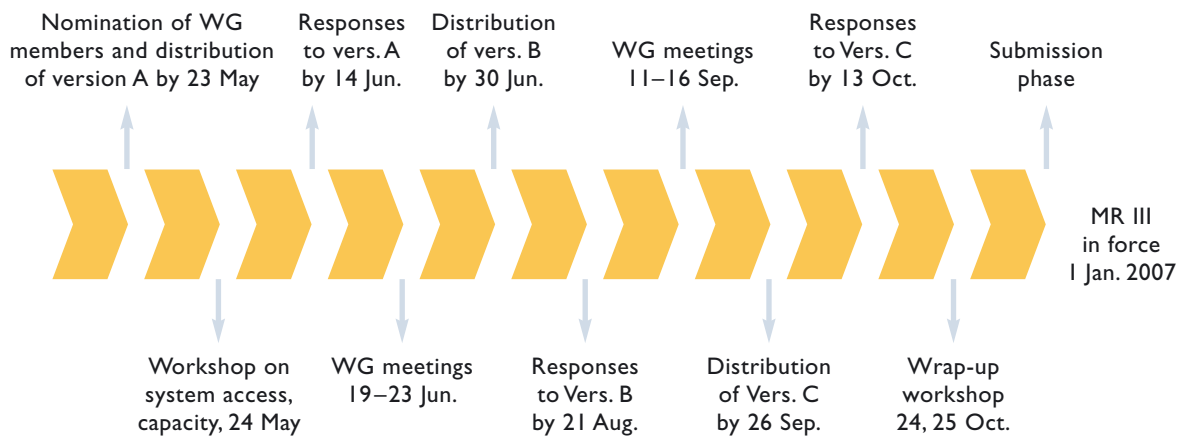
Chart 34



Source: E-Control

→ Schedule for the market rules revision process

Chart 35



Source: E-Control

Overhaul of the capacity-management regime

Apart from efforts to harmonise the market rules with those for the electricity industry, such as the shortening of the transfer process to four to six weeks, already introduced in the electricity sector, development of the gas-market rules focused on reshaping the capacity-allocation regime in the Eastern control area. In line with the new statutory requirements, shipments within the Eastern control area were divided into carriage for the purpose of supplying final consumers directly and so-called “other shipments”, which include imports destined for storage. Schedule management and priority rules were adapted to this classification. In addition, without prejudice to the principle of portability for final consumers, suppliers were given the option of having injection capacity at the control-area border allocated to them on a flexible basis. This increased flexibility implies an obligation on the part of suppliers to use the capacity allocated to them to import gas into the network to supply final consumers when necessary. Due to the restricted scope for network control (due

to physical limits), a certain minimum – seasonally fluctuating – level of importation to the network is necessary to maintain supplies to final consumers.

Capacity expansions

Another focus of the work was the development of processes enabling final consumers and suppliers to request increases in capacity. The new rules will offer all concerned improved planning certainty. Particularly in the case of large projects, many of which have lead times of several years, the previous regime made it impossible to give binding commitments. Under the new arrangements customers will receive binding assurances of network access at a given point in time. System operators will undertake to expand their networks sufficiently to meet customers’ transportation needs, and in return the customers will commit to using the capacity. These mutual obligations will be agreed under capacity-expansion contracts between customers and system operators, and between system operators, and system operators and the control-area manager.

Capacity expansions will be conditional on the conclusion of the above contracts and approval of the related projects as part of the long-term planning of the control-area manager AGGM.

System service quality

An entirely new development was the introduction of standards for the commercial quality of system services on distribution systems. Despite heated discussions at the outset, a consensus on a number of standards and on publication of the related metrics was reached by the time that the market rules were adopted. The distribution system operators' interest group supported the outcome as a fundamentally viable model – including the principle whereby it will be possible to obtain independent certification of compliance with the quality standards.

Regulated transit network access

The new General Terms and Conditions of Cross-Border Transportation, introducing regulated access, give OMV Gas GmbH a coordinating role. Where more than one pipeline system is used, OMV Gas will be legally obliged to offer customers “one-stop shopping” for system access. Another important aspect of the new rules is the obligation of system users to offer their unused transport capacity on a central trading platform, and that of system operators to make any free capacity that is not thus offered available on the secondary market. No agreement was reached on including the use of the respective approved general terms and conditions in the recommended draft.

Due to the extensive preliminary discussions and preparations within the interest groups and industry associations, the discussions during the project took place in a constructive climate and were highly efficient.

→ Supervision of control-area managers (long-term planning)

Long-term plan for the Eastern control area in the FY 2007–2011 period

Under the legal situation prevailing since 27 June 2006, Austrian Gas Grid Management AG (AGGM AG) has had a responsibility under section 12b(1)(4) in conjunction with section 12e Natural Gas Act to draw up a long-term plan for the Eastern control area in accordance with the objectives set out in section 12e(1) of the Act at least once a year. The latter provision states that the objectives of the long-term plan are to ensure that the gas transmission network:

- Meets the demand for transport capacity to supply final consumers, and is adequate to cope with emergency scenarios;
- Achieves a high level of availability (supply security);
- Meets the need for capacity for “other shipments”.

All market participants, including transmission and distribution companies, balancing-group representatives, suppliers, producers, storage companies and holders of transportation rights have a duty to participate in the preparation of long-term plans by providing information at the request of AGGM. Where this concerns gas pipeline systems that do not have the sole function of supplying the domestic market, long-term plans must reflect any increases in the transport capacity reserved for domestic supply.

Pursuant to the objectives set out in section 12e Natural Gas Act, AGGM is required to base its sales volume forecasts and planned measures on the maintenance of full supplies to connected customers and prospective customers seeking connections.

During the year under review, AGGM duly submitted a report on the 2006 long-term plan, taking account of the goals set out in section 3 Natural Gas Act, and this was approved by the Energy Control Commission on 30 August 2006.

Monitoring of projects included in the 2005 long-term plan

The status of the projects included in the 2005 long-term plan is:

- Bad Leonfelden-Linz link: commissioned in October 2005.
- Control valve on the WAG, between Rainbach and Auersthal: executed.
- Construction of a compressor station on the WAG, at Rainbach: executed.
- Expansion of the Pyhrn transfer station: executed.
- Purchase of short-term capacity on the TAG: By bidding in the auction of short-term capacity on the TAG system in Weitendorf, held in June 2005, an additional 20,000 S cu m/h of capacity committed for the period from 1 October 2005 to 30 September 2006 were acquired for the control area. At the auction in June 2006, an additional 30,000 S cu m/h of capacity in Weitendorf were committed for the period from 1 October 2006 to 30 September 2007.
- Südschiene (Southern Trunk Line): execution of the “B12” option examined by the feasibility study. This project, part of which has already been implemented, is divided into three phases:
 1. Allocation of capacity on the TAG system;
 2. Preparation of planning permission submissions for the pipeline projects;
 3. Construction of the pipeline sections following a positive decision regarding the Mellach generating station.
- Increase in the capacity of the WAG between Oberkappel and Rainbach: due to a supplier transfer, capacity at Oberkappel between September 2005 and June 2006 was increased by 30,690 N cu m/h.

- WAG Kirchberg metering station expansion: not yet executed – scheduled for 2007.

Planning information for the 2006 long-term plan

The anticipated capacity requirements of the control area were largely estimated on the basis of the information on changes in the demand structure obtained from a survey of system operators, suppliers, balancing-group representatives and producers, and on that of the capacity-expansion programmes submitted by storage companies.

The sales volume forecast – taking the 2006 gas year as the base year – projects demand growth of about 32% by the 2010 gas year and of 56% by the 2030 gas year. This forecast includes generating stations currently at the planning stage, in Carinthia, Upper Austria and Styria.

The procurement demand model incorporates a peak-load scenario and a summer sales-volume scenario for the 2006–2030 gas years. The relevant entry points continue to be Baumgarten and Oberkappel, but from the 2012 gas year onwards it is assumed that there is also a new entry point for imports in Finkenstein. The summer scenario assumes additional injection capacity in Baumgarten and Oberkappel. Both sales-volume scenarios assume continuous growth in imports into the control area.

The need for “other shipments” in the meaning of section 6 (46a) Natural Gas Act – i.e. shipments from control area entry points to storage facilities, and from production systems or storage facilities to exit points – was surveyed at the same time as demand in the control area, but was not taken into account as the requirements named in responses were too imprecise or uncertain.

From 1 January 2007 on, other shipments for which a binding application for additional capacity has been made will be included in the long-term plan for the following period.

Findings

The long-term planning exercise identified the same capacity bottlenecks as the 2005 long-term plan, but the anticipated arisal times in the winter scenario have been pushed back by one year.

- The winter scenario shows congestion emerging in the “TAG area” in the 2006 gas year. Congestion is forecast to appear in the “Southern” and “Styria” areas from the 2008 gas year onwards.
- The summer scenario points to existing acute congestion affecting shipments to storage facilities in Upper Austria due to the simultaneous operation of generating stations.

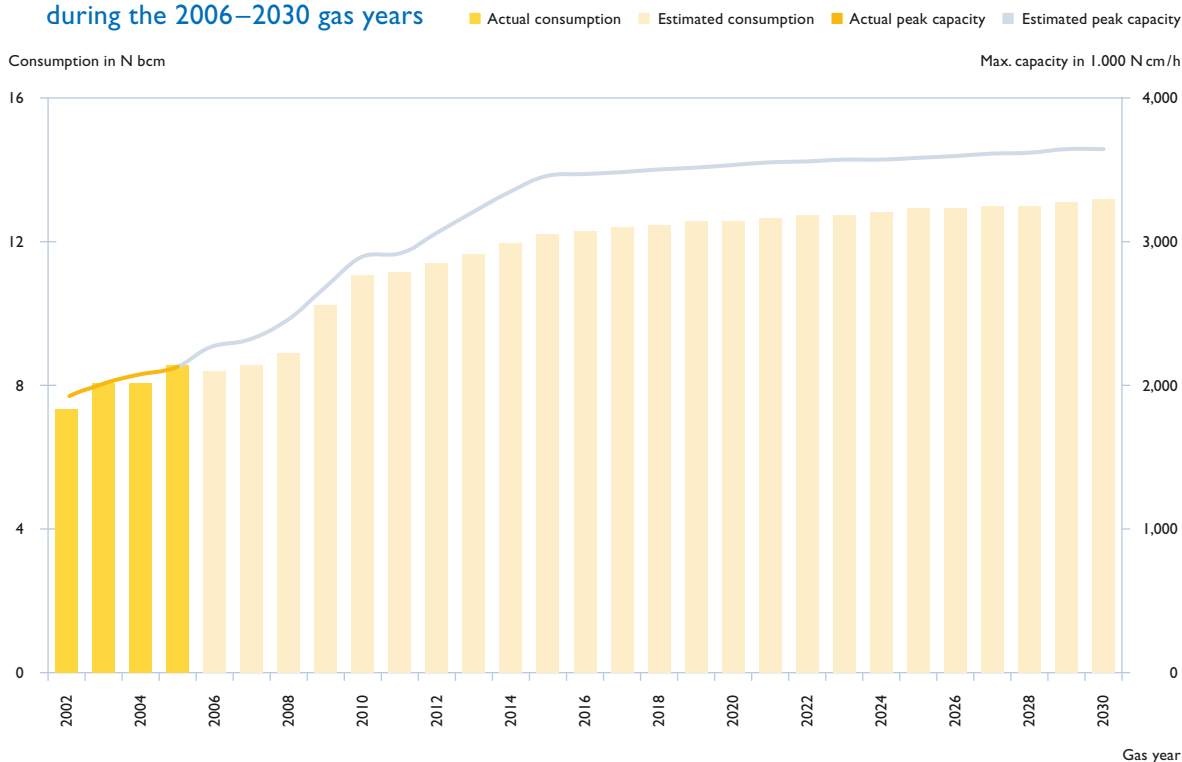
Both the winter peak load and the summer scenario with storage injection show that existing transport capacity is insufficient to meet projected demand growth.

Action required

The projected congestion in the Eastern control area can only be overcome if the projects listed in the long-term plan are implemented. The findings of the 2007 feasibility study (FS 07), expected to be completed during the second quarter of 2007, will be crucial to this. The following are key issues:

→ **Maximum hourly load and demand in the Eastern control area**
 Actual values for the 2002–2005 gas years and estimates for the NB_Max sales scenario during the 2006–2030 gas years

Chart 36



Source: AGGM/NK-K/2006

- The decision on which of the five “basic options” for potential pipeline construction and upgrading listed in the 2006 long-term plan are to be included in the 2007 long-term plan and implemented will be determined by the findings of the FS07.
- The planning and construction preparations for certain pipeline sections necessary for the commissioning of generating stations included in the plan (Baumgarten-Weitendorf and St. Michael-Ebenthal) are to be carried out parallel to the work on FS07 and were due for completion by the summer of 2006. The planning and construction preparations for the Puchkirchen-Finkenstein (TGL) pipeline section are expected to depend on the findings of the FS07.

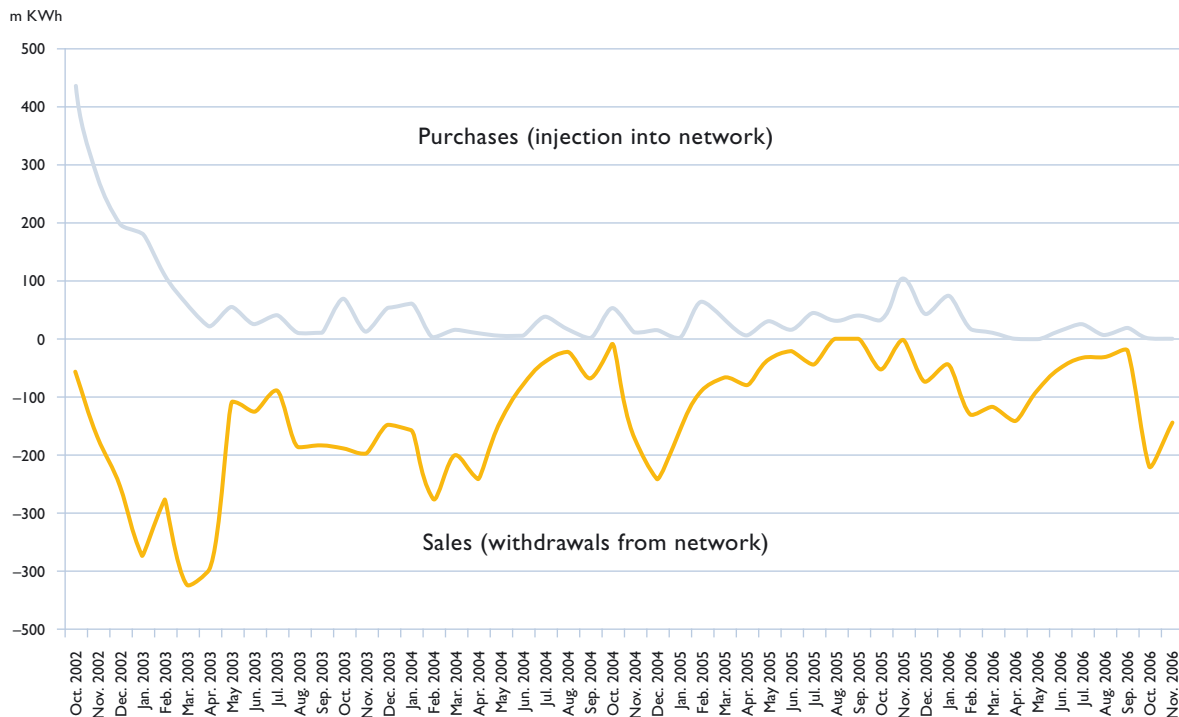
- Participation in the auction of short-term capacity on the TAG system during the summer of 2007 is again planned in order to safeguard security of supply in Styria.
- The transport capacity on the WAG required to supply the control area is to be reserved through to the autumn of 2007.

→ **Gas-balancing market**

Since the start of 2004 the balancing energy called off by the manager of the Eastern control area has been running at 1–2% of total gas demand. In 2006 the amount of balancing energy required by the control-area manager represented 1.25% of total gas consumption in the Eastern control area (2005: 1.3%).

→ **Control-area manager’s monthly balancing-energy requirements (injection and withdrawal) since October 2002**

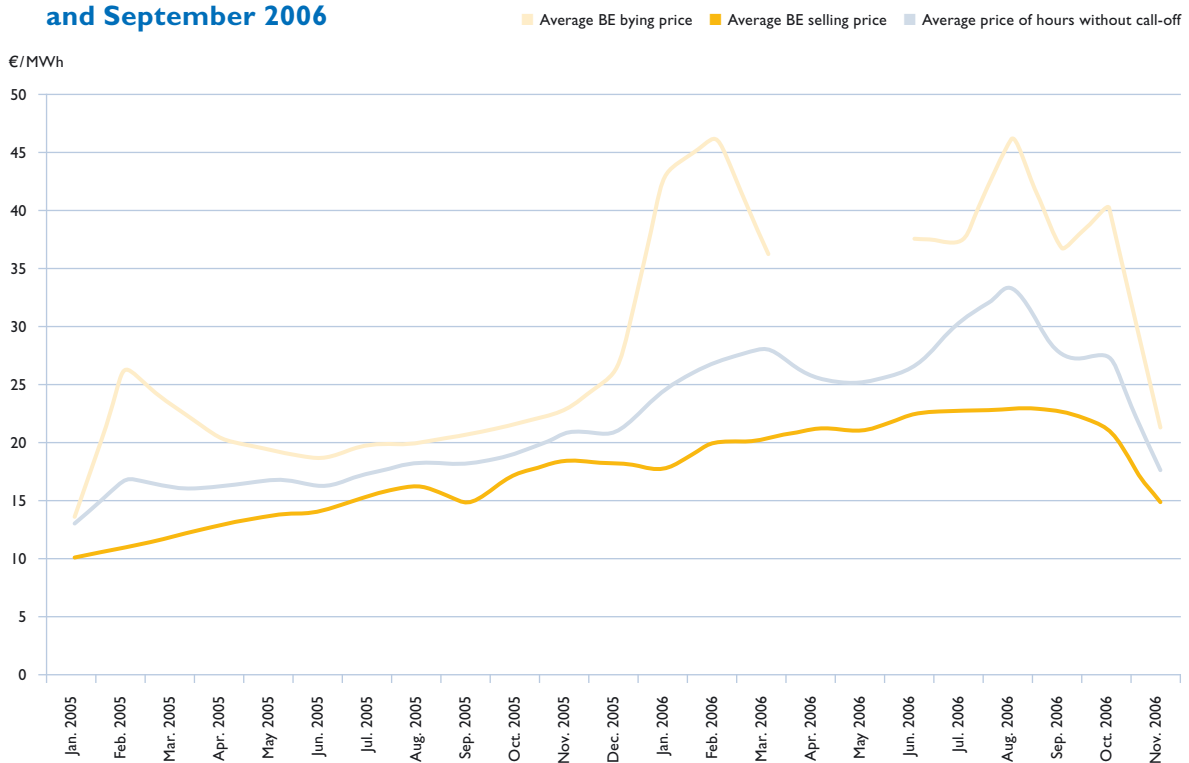
Chart 37



Source: E-Control

→ Balancing-energy price trends between January 2005 and September 2006

Chart 38



NB: The control area manager was not obliged to purchase any balancing energy for import to the network in April and May 2006, and there are hence no prices for these months.
Source: E-Control

In 2006 it was again apparent that the balancing market is increasingly acting as a spot market, with some balancing groups using it to buy or sell gas by making over or under-deliveries. Accrued balancing power (the extent to which commercial balancing groups are long or short) was equal to 4.3% of total gas consumption in the Eastern control area, compared to 4.5% in 2005.

Due to higher gas prices, the balancing-energy suppliers also increased their rates, and in consequence the average selling price of balancing

energy rose from €21.60/MWh in 2005 to €40.20/MWh in 2006, while the purchasing price advanced from €14.40/MWh to €21.0/MWh (Chart 38).

The amounts of balancing energy offered by the six suppliers were sufficient for system control in the Eastern control area. The control-area manager only had to call off balancing energy for import to the network on one day in January 2006 (63% of the amount offered).

→ Gas-release programme arising from the EconGas part-merger

Clearance of the part-merger between the EnergieAllianz partners (Wiengas, OÖFG, Begas, EVN AG and Linz Gas Wärme) and OMV Erdgas (now OMV Gas) that created EconGas was made conditional on the fulfilment of various commitments by the parties, one of which was the implementation of a gas-release programme. This obligation on the part of EconGas and OMV Gas to mount a gas-release programme is intimately connected with plans for the development of a functioning gas hub in Baumgarten.

The fourth auction under the EconGas gas-release programme took place in July 2006. As in previous years, rights to supply contracts with EconGas were sold in an online auction run by CEGH. Some 250 mcm of gas in 25 lots of equal size was offered in an ascending clock auction. There were five successful bidders, from Italy, the Netherlands and the United Kingdom. The winning bids were not disclosed. A total of 27 bidders from eight countries took part in the auction.

For the first time since the gas-release programme was launched, no Austrian gas trader made a winning bid. This shows that permanent entry to the Austrian market is not possible solely by purchasing gas under the programme, and that the auctions are not sufficiently liquid to overcome the entry barrier constituted by access to gas.

Under the terms of the commitments given, EconGas' obligation to hold the auctions lapses as soon as a functioning trading hub is in place in Baumgarten and at least 350 m cu m of gas have been physically traded in one year (from 1 July to 30 June). The criteria for a functioning hub are laid down by the commitments, and

relate inter alia to the number of registered traders (at least seven), the number of nominations made at the hub (at least 30) and the physical volume traded (at least 350 m cu m).

It is still too early to make a final judgment as to whether Baumgarten has become the functioning hub that EconGas undertook to create. The development of trading activities at the Baumgarten gas hub has made significant strides. The transparency of the information published by the operator, Central European Gas Hub has improved, and traders' transaction costs have fallen. However, further progress needs to be made in this direction – particularly in terms of meeting the requirements of domestic and foreign gas traders – if the gas hub is to evolve into a regional market.

The development of the trading activities still appears to depend on the liquidity created by the gas-release programme, meaning that the annual auctions conducted by EconGas will continue to be needed.

→ Regulation of the storage market

Storage services are only offered in the Eastern control area, and there are only two storage operators in Austria – OMV Gas GmbH (three facilities) and RAG (one facility). OMV Gas owns 75% of the storage capacity in the Eastern control area (Table 9).

The legal basis of regulation of the storage market is the Natural Gas Act as amended by BGBl. I No. 106/2006 – chiefly sections 39 and 39a–d – and Directive 2003/55/EC. Under the Natural Gas Act storage companies are required to give eligible customers access to storage capacity at transparent and non-discriminatory terms (section 39 [1]).

→ Storage capacity in Austria in 2005

Table 9

Storage facility	Injection capacity in cu m/h	As % of total capacity	Withdrawal capacity in cu m/h	As % of total capacity	Working gas in m cu m	As % of total capacity
OMV-Schönkirchen	650,000	55 %	740,000	56 %	1,570	56 %
OMV-Tallesbrunn	125,000	11 %	160,000	12 %	300	11 %
OMV-Thann	115,000	10 %	130,000	10 %	250	9 %
Total OMV capacity	890,000	75 %	1,030,000	78 %	2,120	75 %
RAG-Puchkirchen	290,000	25 %	290,000	22 %	700	25 %
Total	1,180,000		1,320,000		2,820	

Sources: www.rohoel.at and www.omv.com

The storage charges are not regulated. However the Natural Gas (Amendment) Act 2002 provided for a comparison of Austrian storage prices with those of other EU member states (section 39a[2] Natural Gas Act as amended). If Austrian storage prices are more than 20% above the average posted prices for comparable services in other member states, the Energy Control Commission is entitled to intervene in price setting on the storage market and determine the costs on which the storage companies' rates are to be based by order (section 39[1]). An initial price comparison carried out by E-Control in November 2004 on the basis of the tariffs posted on the internet showed that some prices charged by the Austrian storage operators were already above the threshold. This led one storage operator to reduce a posted tariff.

Section 39 b imposes a duty on storage companies to submit storage contracts to E-Control as soon as they are concluded. This enables the regulator to ascertain whether access to storage capacity is being granted on a non-discriminatory basis. In 2006 the Austrian storage companies – OMV Gas and RAG – submitted all of the storage contracts; the number was well up on 2005.

Sections 39c–d Natural Gas Act as amended by BGBl. I No. 106/2006 establish additional regulatory responsibilities, including monitoring compliance with the requirements for the con-

tents and publication of the general terms and conditions of storage companies, as well as the regular posting of the injection and withdrawal capacity, and available storage capacity on the internet. We will review compliance with these statutory obligations in 2007.

One of our regulatory objectives is increasing the transparency of the terms and conditions for access to storage capacity. At European level this is supported by implementation of the Guidelines for Good Practice for Storage System Operators (GGPSSO),¹⁴ which were adopted in March 2005 as part of a Madrid Process mini-forum in Brussels and entered into force on 1 April 2005. These guidelines take the form of a voluntary agreement between storage operators and regulatory authorities.¹⁴ However, the European association of storage and system operators, Gas Infrastructure Europe (GIE) and its members strongly recommend compliance. The operative date for compliance was 1 April 2006.

Compliance is being monitored by ERGEG, which published another monitoring report in 2006.¹⁵ Due to the continued deficiencies in the implementation of the Guidelines – also identified in the case of the Austrian storage companies – ERGEG regards the enactment of legally binding arrangements enforcing non-discriminatory access to storage capacity as essential, and has recommended this to the European Commission.

¹³ Posted on www.ergeg.org under ERGEG Documents

¹⁴ Central issues dealt with by the guidelines: are unbundling of storage operation from other parts of companies; the offer of certain storage services (unbundled and bundled services); the allocation of storage capacity and congestion management; transparency requirements; and arrangements for the secondary market.

¹⁵ Posted on www.ergeg.org/

→ Statistical activities

The amendments to the Energy Regulatory Authorities Act and Natural Gas Act in 2002 (sections 14 and 59[1], respectively) transferred responsibility for commissioning and conducting statistical surveys and other statistical studies relating to all forms of gaseous energy sources from the Minister of Economics and Labour to E-Control.

E-Control is thus responsible for compiling both electricity and gas statistics, and its duties extend beyond regulation to statistical reporting on these two fully liberalised network energy markets.

Our statistical functions in respect of the gas industry are defined by the Gas Statistics Order 2002.

After two years' experience of these activities, an amended Gas Statistics Order published during the first half of 2005 adjusted the contents of the surveys to the needs of users of the statistics and the capabilities of gas companies subject to reporting duties. The order was published in the official gazette supplement of the Wiener Zeitung No. 82 on 28 April 2005.

The main changes concerned limiting the surveys to purely physical magnitudes, adapting the reporting requirements to the market rules and precisely defining the random sample surveys used to determine retail prices.

→ Abuse proceedings

Four abuse proceedings relating to the gas sector were initiated in 2006. The main issue was billing, namely, gas companies' failure to itemise the use of system charges properly. The storage companies were called upon to comply with their obligation to submit all storage service contracts to the regulator.

→ Security of supply: responsibilities relating to intervention measures

With the full opening of the natural-gas market on 1 October 2002, the voluntary agreements with the gas companies for managing crises that had grown up over time (emergency supply plans) ceased to apply.

In 2003 E-Control prepared a detailed study of security of supply in the natural-gas sector, commissioned by the Ministry of Economics and Labour. The recommendations included incorporating arrangements specifically designed for natural gas in an amended Energy Intervention Powers Act.

The amendments made to the Energy Intervention Powers Act in 2006 have created a new legal framework for emergency intervention in the gas sector. E-Control is now responsible for drawing up and coordinating measures to be taken in the control areas in case of need, and for ordering the reporting of data required to prepare intervention measures.

Unlike the electricity industry, the gas industry was not catered for by any specific provisions of the Energy Intervention Powers Act. As a result, apart from the general provisions for gaseous energy forms there was no legal basis for emergency intervention measures in the event of a crisis.

Austria enjoys a very high degree of natural-gas supply security. Despite the country's partial import dependency there have been no instances of supply crises that have affected final consumers in any way. In comparison to most other European countries Austria is very well endowed with storage capacity, which plays an important part in supply security (Chart 39).

Security of natural-gas supplies became a headline issue in January 2006. Due to a dispute between Russia and Ukraine regarding the renegotiation of gas prices, some European countries

received reduced natural-gas deliveries for some days. Though it should be emphasised that supplies to Austrian consumers were at no time at risk, the incident sensitised public opinion to the issue.

Beyond congestion management, which is an everyday operational task and is mainly a matter for the control-area managers and balancing-group coordinators, action may be required in crisis situations that do not merely represent seasonal supply tightness and cannot be averted or overcome by market-based measures in good time and at reasonable cost, if at all. The amended Energy Intervention Powers Act creates new roles, adjusted to the realities of a liberalised gas market, for those involved in responding to such contingencies.

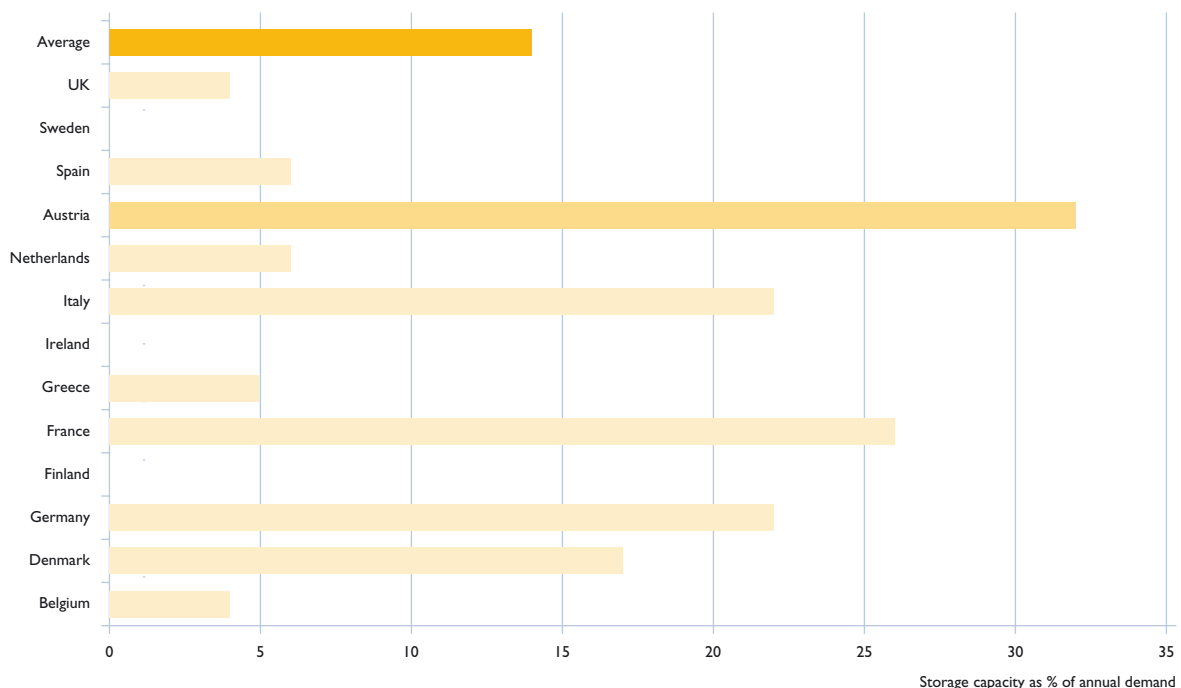
Under the Energy Intervention Powers Act 2006 responsibility for emergency measures aimed at safeguarding gas supplies is assigned as follows:

Minister of Economic Affairs and Labour

- Giving directions to gas companies, control-area managers, settlement agents and producers regarding the production, storage, transmission and distribution, and trading of natural gas;
- Giving directions to final consumers regarding the allocation, withdrawal and use of natural gas, and the exclusion of consumers from the withdrawal of natural gas;
- Issuing regulations regarding the supply of natural gas from and to EU member states and third countries.

→ Storage capacity as a percentage of annual consumption in selected EU member states

Chart 39



Source: E-Control

E-Control

- Preparing and coordinating the measures to be taken in the Austrian control areas in case of need;
- Ordering the reporting of data required to draw up intervention measures.

Control-area managers

- Implementing intervention measures in conjunction with the gas companies, settlement agents and producers.

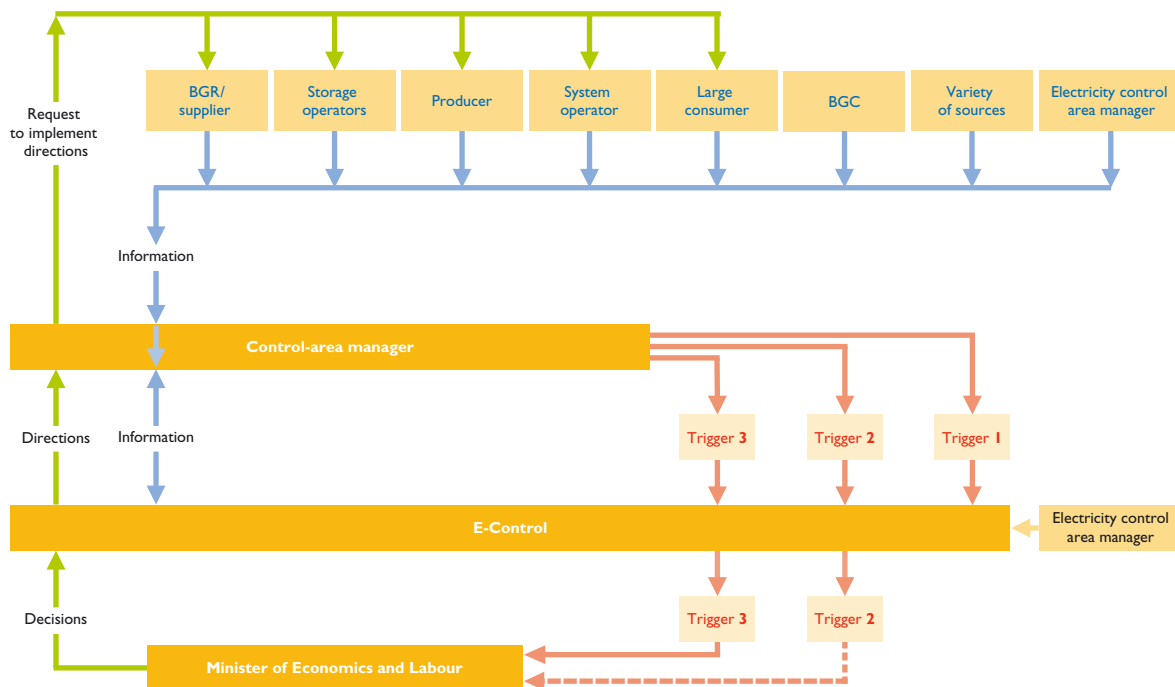
On the basis of this allocation of responsibilities a network of relationships has been developed that provides for information transfers, alerts and instructions (Chart 40).

Control-area managers are responsible for on-going analysis of the supply situation. Some of the information required for this is already available to them under the existing market rules. Additional data is collected by E-Control and made available to the control area managers, using its powers under the Gas-Energielenkungs-Daten-Verordnung (Natural Gas Intervention Data Order) which came into force on 1 January 2007.

This information enables the control-area managers to identify shortfalls as soon as possible and analyse the supply situation accordingly. When assessing the likelihood of a shortage the control-area managers are guided by predefined “triggers” that touch off status reports to other

→ **Network of relationships involved in emergency responses**

Chart 40



Source: E-Control

control-area managers, other market participants and E-Control, and action by them. Given actions are triggered, depending on the threat level. These responses range from increased vigilance to requests to traders, producers and storage operators to prepare to activate additional supplies, and similar measures.

If a control-area manager's assessment identifies the transgression of a "trigger" threshold a pre-defined three-stage process is set in motion:

- a) Control-area manager contacts E-Control:
 - Coordination of the preplanned measures;
 - Notification of designated market participants.
- b) Control-area manager and E-Control contact Ministry of Economics and Labour
 - Situation report;
 - Recommendations for operational measures;
 - Activation of crisis mechanisms (Energy Intervention Council; Main Committee of the National Council; order under Energy Intervention Powers Act).
- c) Control-area manager implements crisis management measures
 - Operational instructions to market participants;

- Monitoring of implementation of the instructions;
- Review of the measures (effectiveness);
- Review of the situation.

The control-area manager's instructions¹⁶ are given under the powers conferred by the Natural Gas Intervention Data Order. The instructions can be roughly divided into two categories:

- Activating additional supplies;
- Restricting consumption by given end-user groups.

The aim of these emergency arrangements is to prevent supply disruptions by maintaining network pressure in the event of significant problems affecting natural-gas supplies which cannot be sufficiently countered, if at all, by market-based measures. It is, as a minimum, to maintain undisrupted supplies to consumers who cannot switch to an alternative energy source, and the supply of which is necessary for economic reasons or to keep essential services running. These groups are also referred to as "protected consumers". They include household customers in the meaning of the Security of Supply Directive (Directive 2004/67/EC).

¹⁶ It should be noted that the Tyrol and Vorarlberg control areas have no direct access to storage capacity or domestic production capacity. The measures open to them are thus limited to restrictions on consumption by end-users.



→ Participation in CEER and ERGEG

In 2006 the main focus of international cooperation relating to the gas sector was the work programmes of the Council of European Energy Regulators (CEER) and the European Regulators' Group for Electricity and Gas (ERGEG). The main task of the CEER is to prepare work for ERGEG – a consultative body set up by the European Commission. The main feature of the first half of the year was the preparations for the Madrid Forum, which took place from 18–19 May 2006.

→ XI Madrid Forum

The Madrid Process was launched by the European Commission in 1999. It brings together representatives of the European Commission, the regulatory authorities, member states, the gas industry and various other stakeholders to discuss issues related to the creation of an internal gas market – especially those not dealt with by the Gas Acceleration Directive. The main topic of the XI Madrid Forum was the draft explanatory notes to Regulation (EC) No 1775/2005 on conditions for access to the natural-gas transmission networks. The agenda items included:

- The tariffs for access to European transmission networks;
- Capacity allocation mechanisms and congestion management;
- Monitoring of compliance with the Guidelines for Good Practice for Storage System Operators;
- Guidelines for balancing; and
- The Gas Regional Initiative.

The tariffs for access to European transmission networks

Article 3 of Regulation (EC) No 1775/2005 on conditions for access to the natural-gas transmission networks requires that the tariffs be cost

reflective and non-discriminatory. The European Commission has drawn up a draft explanatory note on Article 3 which fleshes out the details of tariff design. ERGEG played a key role in the drafting process.

Capacity allocation mechanisms and congestion management

As with the tariff issue, the Commission presented an explanatory note on Article 5 of Regulation (EC) No 1775/2005 (capacity-allocation mechanisms and congestion management) drafted by ERGEG. The purpose of this is to ensure that capacity-allocation mechanisms are transparent and non-discriminatory, and that congestion-management procedures are effective.

Monitoring of compliance with the Guidelines for Good Practice for Storage System Operators

The European Commission had asked ERGEG for assistance in monitoring compliance with the Guidelines for Good Practice for Storage System Operators. ERGEG presented an interim report which found that there were deficiencies in the implementation of these voluntary guidelines, and that considerable work remained to be done, in particular, with respect to transparency and secondary markets.

Guidelines for balancing

Conscious of the importance of fair and non-discriminatory balancing rules, ERGEG had held a consultation process with a view to drafting an explanatory note on Article 7 of Regulation (EC) No 1775/2005. A final version of the guidelines that will serve as a basis for the explanatory note will be discussed at the Madrid Forum to be held at the start of 2007.

Guidelines for open-season procedures

The discussions at the Madrid Forum led to a request to ERGEG to draw up guidelines for open-season procedures. These consist of a process starting with an open assessment of market demand for additional gas-transmission capacity followed by a capacity-allocation phase. The Forum also asked ERGEG to formulate guidelines for transparency in respect of access to transmission systems.

E-Control contributed to all the working groups, and chaired those devoted to cross-border tariffication, open-season procedures and transparency. We co-organised a workshop in Brussels on “Requirements of banks on the financing of gas infrastructure”, held in November 2006 in conjunction with the CEER Secretariat. Since the start of 2006, Walter Boltz has been the chairman of the CEER/ERGEG Gas Working Group.

Gas Regional Initiative

ERGEG launched a Gas Regional Initiative (GRI), along similar lines to the Electricity Regional Initiative, on 25 April 2006. The goal of the GRI is to create properly functioning regional gas markets as a stepping stone towards a single European gas market.

To this end ERGEG unveiled three regional energy-market projects (REMs). These are: the North-West Region comprising Belgium, Denmark, France, Germany, Ireland, the Netherlands,

Northern Ireland, Sweden and the United Kingdom; the South Region consisting of France, Portugal and Spain; and the South-South East Region made up of Austria, the Czech Republic, Greece, Hungary, Italy, Poland, Slovakia and Slovenia.

The projects, headed up by lead regulators, bring together representatives of ministries, transmission and distribution system operators, storage operators, hub operators, shippers and traders, and consumer associations in the region with the aim of overcoming barriers to competition.

ERGEG is coordinating the REMs in order to drive progress towards the single market ahead by achieving a common approach and parallel development of the regional markets. ERGEG will report to European market participants and the Commission on the Initiative at Madrid Forum meetings.

The Commission, and in particular Commissioners Andris Piebalgs (Energy) and Nellie Kroes (Competition), are supporting the GRI and watching its progress closely. Market participants have also welcomed the Initiative, and are invited to make an active contribution to its success.

South-South East REM

E-Control and the Italian regulator AEEG are co-chairing the South-South East Region. The SEE Region began work in June 2006, and mapped out its objectives and an action plan in consultation with market participants.

After concluding cross-border operational balancing agreements (OBAs) as rapidly as possible, the Region will be aiming to press ahead with implementation of Regulation (EC) No 1775/2005 and Directive 55/2003/EC. Case studies on a variety of gas transportation routes in the region are to be used to assess the extent to which transmission-system operators are complying with the regulation and the directive, and where improvements are still needed in order to achieve non-discriminatory access to gas pipelines and LNG markets.

The regulators are also studying a regional entry-exit tariff scheme, the use of hubs as

regional balancing points and the possibility of a regional one-stop-shop service provider. The results of the analysis of transportation routes and the findings of the studies will influence the approach taken in the Region during the coming year.

Outlook

The main issues addressed by the CEER/ERGEG work programme for 2007 will be gas system operation and gas infrastructure investment. Special attention will be focused on the concept of a European gas grid, and the regulatory treatment of new infrastructure.



Responsibilities common
to electricity and gas 2006

ANNUAL
REPORT



→ Review of four years' work by the arbitration service

In its fourth year of operation the arbitration service again showed its worth as a contact point for consumers. Apart from conducting arbitration procedures under section 10a Energy Regulatory Authorities Act – disputes arising from electricity and gas bills, and network connection issues were particularly frequent – during the year under review the arbitration service fielded many inquiries from consumers wanting bills checked or seeking general information about the liberalised electricity and gas markets.

All that the arbitration service needs to be able to swing into action is an informal written application (by letter, fax or e-mail), briefly outlining the events in question and enclosing the relevant documentation. Complaints about events going back further than four years before the application or charges that were due before the cut-off date are ineligible. The same applies to disputes concerning pending claims on which courts or administrative tribunals have already ruled or which are already the subject of an arbitration procedure.

Of the 666 procedures since the arbitration service was established, 160 took place in 2006.

The number of procedures declined somewhat as compared to the previous year. The arbitration service attributes this mainly to the fact that, thanks to the experience that it has accumulated, some problems can be resolved at once or after a quick talk with company concerned. Some inquiries raised questions similar to issues that had already been dealt with by arbitration procedures. Here, the company concerned was usually asked for information about the case in question by e-mail or telephone, and the customer informed of the response. Although not all inquiries led to the initiation of formal proce-

dures this did not influence the results. Where a company had made a mistake the customer was offered the same solution as would have emerged from an official arbitration procedure.

The issues involved in arbitration and reasons for complaints were much the same as in previous years. Most complaints were again connected with inexplicable increases in consumption or bills that consumers were unable to understand. There was a slight increase in complaints concerning connection costs arising from new or expanded installations, supplier transfers and tariff changes. There was a sharp rise in inquiries about outstanding debts, with a growing number of consumers seeking the arbitration service's assistance in rescheduling instalments.

For further information on the activities of the arbitration service readers are referred to its report for 2006, which we will be glad to send on request.

→ Public information activities

Lecturing and publications by E-Control staff

In 2006 we again mounted a major public information effort to keep consumers and market participants up to date with current developments on Austria's liberalised energy markets. To this end, E-Control staff members addressed some 100 domestic and international meetings and conferences on energy market liberalisation.

Staff also contributed to relevant trade magazines and specialist journals.

Media relations work

During the year under review we again gave high priority to public relations work, and this played a prominent part in activities throughout the

year. For instance, we held a number of press conferences and energy round tables, frequently issued press releases and regularly briefed journalists off the record. Throughout 2006 the gas and electricity industry investigations by the Federal Competition Authority and E-Control generated an increased call for information and more inquiries from energy consumers, and we responded by stepping up our PR activities.

Tariff calculator

For most domestic and small-business consumers the E-Control tariff calculator is still the only means of making quick, at-a-glance individual gas and electricity price comparisons. To get a result all that is needed is to input one's postcode and annual demand. Users are then shown a summary view with a list of potential suppliers and their overall prices, and a detail view with the rates broken down into energy and system charges, taxes and levies. Other information available via the tariff calculator includes power labelling details, suppliers' factsheets (in the form of pdf files), and suppliers' and system operators' contact details.

The number of queries rose again in 2006 to reach a total of about 750,000 (electricity and gas), with as many as 15,000 computations on peak days. Electricity accounts for most of the queries (about 78%). Of these, around 90% concern domestic, 8% small business and 2% farm tariffs. Some 93% of the gas calculations were of domestic and 7% of business rates.

There is also "watchdog" function that automatically alerts users to changes in the tariffs of their choice between the 7th and 10th of each month. At present there are about 7,000 registered users of this service.

We naturally make every effort to continue to upgrade the calculator and extend its functionality. For instance, three buttons have been added to the summary view. These enable users to decide whether discounts are to be included in the calculation, and if so which sort.

During the year we continued to offer a service provided in conjunction with the Ö3 radio channel that lets domestic electricity and gas consumers text queries on the lowest energy prices to the tariff calculator. This was a three-step process:

1. The consumer sends a text message to 0900 600 600 with the keyword "Strom" (electricity) or "Gas".
2. The next step is to input one's postcode.
3. Finally the user must send his/her annual demand in kilowatt-hours (kWh).

The text message answer gives the cheapest supplier in the user's area, along with lowest prices currently available.

We will continue to offer this service in cooperation with Ö3 in 2007.

Hotline

E-Control runs a hotline for general consumer inquiries on 0810 10 25 54. Calls are received from 400–500 consumers per month. These are mostly general inquiries relating to liberalisation, and concern such matters as supplier transfers, price comparisons and how to obtain power generated from renewable energy sources, as well as information about individual suppliers. The number of calls to the E-Control hotline rose by another 26%, to about 5,000 in 2006. The demand for information tends to rise sharply whenever the energy companies announce price increases.



→ January

1 Jan. 2006 Energie Steiermark (Estag) and Steweag-Steg up overall prices by 5%, Kärntner Elektrizitäts AG (Kelag) by 3.9%. Salzburg AG raises its gas prices by 15%, BEGAS by approx. 5% and Vorarlberger Erdgas (VEG) by 7%. All Austrian system operators' system charges are reduced, by an average of 3%.

1 Jan. 2006 Russia halts gas deliveries to Ukraine, leading to an 18% drop in supplies to Austria. The shortfall is met by withdrawals from Austrian storage facilities.

3 Jan. 2006 Austrian households' electricity consumption is above the EU average at 4,770 kWh/year. The average for the EU-25 is 4,040 kWh.

4 Jan. 2006 Kelag plans to invest a total of €270m in generating stations, network projects and other schemes by 2008.

4 Jan. 2006 Rohöl-Aufsuchungs AG (RAG) plans to build a gas storage facility with a capacity (working gas) of 2.4 bn cu m in Haidach, Salzburg.

9 Jan. 2006 Stadtwerke Klagenfurt AG has decided to spin out its district heating, gas and electricity businesses to a new subsidiary called Energie Klagenfurt.

10 Jan. 2006 EVN is to invest €65m in building six new biomass generating stations in Lower Austria.

10 Jan. 2006 EU energy commissioner Andris Piebalgs wishes to commit the 25 member states to building up gas stocks. He wants every country to be capable of bridging a two-month supply failure.

12 Jan. 2006 Amir Ghoreishi has been appointed to the EVN supervisory board as representative of Germany's Energie Baden-Württemberg (EnBW).

14 Jan. 2006 The Illwerke-VKW Group is to invest about €161m in new generating capacity. Most of the money will go to building the Kops II power station.

19 Jan. 2006 The chemical industry and energy sector slam the EU Water Framework Directive – already on the statute book – which aims to achieve “good status” for European surface waters by 2015. They say the directive will require major modifications to plant, and reduce the capacity of some generating stations.

19 Jan. 2006 EU Commission President Jose Manuel Barroso backs nuclear power as an alternative to oil and gas.

20 Jan. 2006 According to IG Windkraft 117 wind farms with a combined capacity of 218 MW were built in Austria in 2005.

21 Jan. 2006 Verbund is acquiring a 25% interest in French electricity and gas company Poweo at a total cost of €100m.

23 Jan. 2006 The proportion of electricity demand in Lower Austria met by green power rose from 7% in 2004 to 10.3% in 2005.

24 Jan. 2006 Oekostrom AG issues 14,494 shares, increasing its share capital from €5.4m to €6.9m.

25 Jan. 2006 E-Control chief executive Walter Boltz is reappointed by the economics ministry for another five years up to 2011.

26 Jan. 2006 Cold weather fuels record gas demand. According to Austrian Gas Grid Management (AGGM) daily consumption hit an all-time high of 41.7 m cu m on one day in January.

27 Jan. 2006 The cost of electricity rose by 3.1% and that of gas by 6.1% in 2005. Energy prices climbed by an average of 9.3%.

28 Jan. 2006 Some 47% of all EU citizens would like to see Brussels do more to coordinate energy policies in Europe according to a Eurostat Eurobarometer poll.

→ February

- 1 Feb. 2006** EVN has made a binding offer for a 67.5% stake in Romanian power company Electrica Muntenia Sud (EMS).
- 2 Feb. 2006** The Austrian energy sector is forecast to invest approx. €11.2bn by 2015. Of this €5.7bn will go to new power stations and €5.5bn to network expansion and upgrading.
- 2 Feb. 2006** Austrians consumed 69.3 TWh of electricity in 2005. Power output rose from 64.7 to 66.5 TWh.
- 3 Feb. 2006** Verbund signs a framework deal with the Association of Austrian Municipalities under which it will start supplying localities with an annual demand of less than 100,000 kWh.
- 9 Feb. 2006** EU energy commissioner Andris Piebalgs wants to strengthen competition on the European electricity and gas markets. He proposes the foundation of a European network agency.
- 11 Feb. 2006** Tiwag acquires a further 25% of Innsbrucker Kommunalbetriebe (IKB) for €118m, taking its holding to 50% minus one share.
- 13 Feb. 2006** During the G8 summit in Moscow the Russian finance minister announced that state energy group Gazprom will start granting other companies access to its gas export pipelines.
- 14 Feb. 2006** Austrian Federal Chamber of Commerce president Christoph Leitl calls for the abolition of the constitutional provision (Nationalisation Act) requiring majority public ownership of the provincial energy utilities and Verbund.
- 17 Feb. 2006** The European Commission suspects price collusion between European energy groups and announces cartel investigations. An inquiry into the competitive conditions under which over 3,000 electricity and gas suppliers are operating has been under way since summer 2005.
- 24 Feb. 2006** E-Control and the Austrian Energy Agency have developed an online energy efficiency

calculator. This works out potential power savings in the home.

- 24 Feb. 2006** Herbert Schröfelbauer is reappointed as chairman of the managing board of Verbund – Austrian Hydro Power AG (AHP) until 2011.
- 24 Feb. 2006** Verbund has decided to go ahead with the construction of the Limberg II pumped-storage generating station in Kaprun which is due to come online in 2012.
- 25 Feb. 2006** Renewable electricity is now meeting 11.6% of power demand in Upper Austria, and its contribution is set to rise to 13% by the end of the year.
- 28 Feb. 2006** Latest trade figures show that gas imports rose by 46% to €1,74bn in 2005. Electricity imports and exports were in balance at about €3bn.
- 28 Feb. 2006** Energie AG Oberösterreich (EAG) plans to spend €600m on expanding its wind power capacity over the next decade. The company plans to boost capacity from 700 MW to 1,700 MW.

→ March

- 1 Mar. 2006** Wien Energie puts up its energy price for electricity by 0.6 cent/kWh, increasing the overall price by 5.1%. The company raises its gas price by 17.2% to 0.71 cent/kWh. Salzburg AG lifts its energy and overall electricity prices by 12% and 5.2%, respectively. Tiwag hikes its electricity energy price by 7.5%.
- 9 Mar. 2006** Verbund – Austrian Power Grid (APG) managing board member Heinz Kaupa is reappointed for another five years.
- 15 Mar. 2006** The Kuratorium für Elektrotechnik (Electrical Engineering Board) and eastern Austrian electricians' guilds demand compulsory wiring inspections for all private households. Inspections every three years are already a statutory requirement for business premises.

16 Mar. 2006 According to the E-Control annual report Austrian domestic consumers are missing out on €200m of potential savings on their electricity and gas bills. Only 45,000 Austrians switched their electricity suppliers and 10,000 their gas suppliers in 2005.

17 Mar. 2006 The Macedonian government has accepted EVN's bid for a 90% interest in state-owned electricity distributor ESM Distribucija.

18 Mar. 2006 Energy-intensive industries in Germany will be exempted from energy and electricity tax with effect from 1 August. The Federation of Austrian Industry calls for Austria to follow suit.

29 Mar. 2006 The CEOs of provincial energy utilities Tiwag and EAG open exploratory talks on a joint venture.

→ April

1 Apr. 2006 Vorarlberger Kraftwerke AG (VKW) increases its overall domestic and business electricity prices by 5% or 0.6 cent/kWh.

3 Apr. 2006 During the 2005/06 winter half-year Verbund-APG's north-south high-voltage power lines were overloaded every day.

7 Apr. 2006 According to the results of an opinion poll conducted by the Sozialwissenschaftliche Studiengesellschaft, 69% of all Austrians believe the construction of new power stations to be necessary.

7 Apr. 2006 The Timelkam biomass generating station – the largest in Austria – has entered service.

12 Apr. 2006 EVN chief executive Burkhard Hofer has named late September or early October as the planned date for the "Austrian electricity solution" part-merger to commence operations.

15 Apr. 2006 EVN is to build another wind farm, with 13 turbines, near St. Pölten. Annual capacity at 2,000 full-load hours will be approx. 47.6 GWh.

30 Apr. 2006 EAG and Linz AG will withdraw from the Energie Allianz joint venture on 30 September 2006.

→ May

1 May 2006 EAG increases its overall domestic electricity price by approx. 5%.

5 May 2006 Hungary threatens to respond to overloading of the interconnector with Austria by shutting it down, so as to prevent the collapse of its own electricity grid.

6 May 2006 Since the liberalisation of the Austrian electricity market in October 2001 about 5% of domestic and 10–12% of small-business consumers have switched suppliers.

8 May 2006 The OMV oil and gas group and Austria's largest electricity generator, Verbund plan to merge. The nature of the transaction remains to be decided.

9 May 2006 Burgenland governor Hans Niesl announces that the province is aiming for energy independence by 2013.

11 May 2006 The Voitsberg thermal power station is to be closed.

17 May 2006 EVN plans to invest some €180m in five new energy and infrastructure projects in central Lower Austria.

18 May 2006 The European Commission raids the offices of gas companies in a number of European countries because of suspicions of price collusion.

24 May 2006 The planned merger between OMV and Verbund is torpedoed by opposition from provincial governors and demands for a 51% state holding in the merger company.

24 May 2006 In 2007 the green-power surcharge to fund renewable generating stations is to be replaced by an annual lump-sum charge of €15. Households and businesses have been paying a surcharge on every kilowatt-hour consumed.

27 May 2006 Oekostrom AG is to build a wind farm with 28 turbines, each with a capacity of 2 MW, in western Hungary.

30 May 2006 On 20 April the Austrian government reappointed all of the members of the Energy Control Commission for a further five years.

→ June

- 1 Jun. 2006** Bewag raises its electricity prices by 6%.
- 3 Jun. 2006** Tigas plans to expand its gas network to reach districts in the Ziller Valley and the Kufstein area. The Imst-Landeck pipeline will be extended. In addition, the company plans to build an interconnector with Italy, via the Brenner Pass.
- 14 Jun. 2006** The European Commission has unveiled a Green Paper setting out a new energy strategy for Europe. The three main goals are sustainability, competitiveness and security of supply.
- 17 Jun. 2006** EVN's bid for the Negotino thermal power station in Macedonia is accepted.
- 22 Jun. 2006** VKW plans to invest approx. €27.5m in its power network business during its 2006 financial year.
- 24 Jun. 2006** The Kelag supervisory board has approved the construction of the Feldsee pumped-storage generating station in Flattach. Work is due to begin in August 2006.
- 27 Jun. 2006** At a meeting in Vienna, the energy ministers of Austria, Bulgaria, Hungary, Romania and Turkey sign an agreement in principle to build to the Nabucco pipeline.
- 28 Jun. 2006** Plans and documentation are to be drawn up for an environmental impact study on all four hydro power station projects in Tyrol. These are the Kauner Valley and Sellrain-Silz expansion schemes, and new stations in the Malfon Valley and near Matrei.

→ July

- 1 Jul. 2006** Work has begun on the Verbund-AHP Limberg II underground pumped storage generating station, which is due to enter full operation in 2012.
- 6 Jul. 2006** IG Windkraft demands amendment of the Green Electricity Act which came into force on 1 July, and opposes reduced injection tariffs.
- 8 Jul. 2006** The European Commission has cleared the Austrian renewable support scheme. The approval is retroactive, and covers both the Green Electricity Act 2002 and the amended Act which entered into effect on 1 July 2006.
- 15 Jul. 2006** The Federation of Austrian Industry has reached agreement with environment minister Josef Pröll on the allocations of emission allowances for the next emission trading period (2008–2012). Allowances for an annual 24.5 m tonnes (t) will go to industry and 8.3 m t to the energy sector.
- 15 Jul. 2006** Eurostat reports that electricity prices for households with an annual consumption of 3,500 kWh rose by 4.6% in the EU-25 and by 9% in the EU-15 in the year to January 2005. Prices in Austria fell by 5.2% over the period.
- 25 Jul. 2006** Prices rise on the electricity exchanges as a result of the heat wave. The peak-load contract has hit €174/MWh on the Austrian EXAA.
- 25 Jul. 2006** Verbund is already supplying 40,000 final consumers, and anticipates an increase to 50,000–60,000 by the end of the year according to CEO Hans Haider.
- 26 Jul. 2006** EnBW ups its holding in EVN from 29.7% to 31.2% by purchasing shares from Raiffeisenlandesbank Oberösterreich.

→ August

16 Aug. 2006 EVN and Wien Energie have brought an action against Verbund in the Vienna commercial court for alleged deception of consumers. The two are seeking an injunction to prevent Verbund from making price comparisons that are not based on overall prices.

21 Aug. 2006 EAG plans to generate 75% of the electricity it sells by 2015. It will spend an annual €50m on building additional power stations and expanding its electricity network.

30 Aug. 2006 Walter Boltz of E-Control sees overall electricity and gas prices climbing by about 10% by the end of the year, and the energy price components by as much as 20%. Boltz anticipates a calming effect from the reduction in electricity and gas system charges due at the start of 2007.

31 Aug. 2006 Verbund must desist from claiming in its advertising that it can offer electricity consumers savings of up to 30% on the energy prices they pay. The Vienna commercial court has granted a temporary injunction prohibiting it from engaging in “misleading advertising”.

→ September

1 Sept. 2006 Austrian nationwide supplier Unsere Wasserkraft raises its electricity prices by 11%.

1 Sept. 2006 Erdgas OÖ, Linz AG, Kelag and E-Werk Wels up their gas prices. Linz AG increases overall prices by 6–9%, Kelag by 8%, and Erdgas OÖ and E-Werk Wels by 9%.

6 Sept. 2006 EAG wants to establish a “Centre-West Alliance”. The company is negotiating with Tiwag and Salzburg AG.

6 Sept. 2006 Oberösterreichische Ferngas sells its 39% stake in South Bohemian gas company J&P to the E.ON Czech Group.

8 Sept. 2006 A hydro power station has opened on the Vienna Hochquellwasserleitung aquifer. The station is expected to generate 3 GWh/year of electricity.

13 Sept. 2006 The “Estag scandal” case is dropped after three years, because the public prosecutor failed to uncover any evidence of criminal wrongdoing.

15 Sept. 2006 EnergieAllianz has once again taken legal action against Verbund. This time the reason is the adapted Verbund advertising campaign with the “Cheaper electricity should be banned” slogan.

19 Sept. 2006 The government wishes to set up a renewables foundation with financial support from ÖIAG, OMV and Verbund. Its plans call for the fund to be endowed with €500m over the next five years.

21 Sept. 2006 Talks on the mooted acquisition by Tiwag of an interest of 25% plus one share in EAG are to be completed by the end of the year.

29 Sept. 2006 EconGas, Gas- und Warenhandels GmbH (GWH) and Centrex have signed agreements with wholly owned Gazprom subsidiary Gazexport under which the latter will supply gas to Austria until 2027.

30 Sept. 2006 As previously announced, EAG and Linz AG withdraw from EnergieAllianz. The Upper Austrian provincial government acquires the 9.375% holdings of Wien Energie and EVN in EAG.

→ **October**

1 Oct. 2006 New injection tariffs for renewable electricity will come into force in Austria on 1 January 2007.

1 Oct. 2006 EAG intends to reorganise itself as a holding company with 11 central service units and 12 independent subsidiaries.

5 Oct. 2006 Austrian companies have bid for the contracts to build four hydro power stations in Bosnia.

5 Oct. 2006 Wind energy is now meeting 10% of electricity demand in Lower Austria.

9 Oct. 2006 According to an IMAS opinion poll 89% of Austrians approve of the expansion of wind energy, while 97% oppose atomic power stations and 93% approve of the use of solar energy.

9 Oct. 2006 Verbund-APG has installed three phase-shifting transformers as a means of safeguarding electricity supplies to Styria in place of the long delayed 380 kV line.

10 Oct. 2006 EVN has submitted the winning bid for four Bulgarian district-heating stations in Plovdiv and Asenovgrad.

13 Oct. 2006 Kelag has commenced construction of the Feldsee storage power station in Flattach, in the Hohe Tauern Alps.

13 Oct. 2006 EAG and Linz AG are forming an electricity distribution joint venture. The new firm, founded with retroactive effect from 1 October 2006, will have four lines of business: domestic, large, chain and out-of-area customers.

19 Oct. 2006 Tiwag will initially proceed with only one of the four planned hydro power station projects – the Sellrain-Silz pumped-storage-plant expansion.

20 Oct. 2006 Europe's largest forest biomass-fired generating station, in Simmering, Vienna, enters service. The plant has a capacity of 66 MW.

24 Oct. 2006 EnBW raises its stake in EVN to over 35%, again acquiring the additional interest from Raiffeisenlandesbank Oberösterreich.

25 Oct. 2006 The Verbund supervisory board has not extended CEO Hans Haider's contract. Haider will leave Verbund in May 2007. Ulrike Baumgartner-Gabitzer has been appointed to the managing board with effect from 1 January 2007.

→ **November**

2 Nov. 2006 Verbund warns of the danger of a blackout during the winter. The company says that congestion on the north-south power lines will again rise dramatically in the winter months.

3 Nov. 2006 The new Macedonian government has cancelled the sale of the TEC Negotino thermal power station to EVN.

8 Nov. 2006 Kelag subsidiary Wärmebetriebe GmbH plans to invest €400m in bioenergy over the next decade.

10 Nov. 2006 EVN has spoken out in favour of a resumption of talks on joint ventures between EnergieAllianz and Verbund.

14 Nov. 2006 The completion by the end of the year of the third parallel TAG pipeline (Loop II) from Lower Austria to the Italian border will increase the system's capacity from 37 to 41 bn cu m.

15 Nov. 2006 The Austrian cabinet has approved the €500m renewables fund.

15 Nov. 2006 BEGAS increases its energy price by about 9%.

19 Nov. 2006 The paper and pulp industry hits out at the subsidising of biomass under the Green Electricity Act, which it says has led to timber shortages and a 40% rise in prices.

20 Nov. 2006 A policy study by Wifo (the Austrian Institute of Economic Research) calls for more competition in the Austrian energy sector. The Institute estimates that this would accelerate economic growth by 0.5% per year.

24 Nov. 2006 E-Control forecasts a continuation of the renewable electricity boom in 2007. It says support payments are set to rise from €189m in 2006 to €286m in 2007.

25 Nov. 2006 According to a study by the Vienna University of Technology the average household could save more than 30% of its electricity costs. The biggest power guzzlers are old and second-hand appliances, lighting and standby operation. The EU is calling for energy savings of 20% by 2020.

30 Nov. 2006 Verbund CEO Hans Haider announces an expansion drive in Eastern Europe. The group plans to enter the Russian hydro-power market. It is in the process of acquiring a Greek company with a 150 MW power station which it will upgrade to a capacity of 600 MW.

→ December

1 Dec. 2006 The final reports of the Austrian electricity and gas industry investigations have been unveiled. The recommendations include a package of measures designed to stimulate competition. The Energy Security of Supply Act 2006 which is due to enter into force on 1 January 2007 requires companies to state their net energy prices in kWh. Consumers must now be given three months' notice of price increases.

1 Dec. 2006 EVN raises electricity and gas prices in Lower Austria. Electricity is up by 5% and gas by 9.3%.

2 Dec. 2006 Verbund and France's Poweo start work on building a new power station which is due to come online in 2009.

5 Dec. 2006 The Administrative Court of Appeal has announced a verdict in the legal dispute concerning the reimbursement of energy levies to large consumers (1996–2001). The levies will only be returned to industrial and not to service companies.

12 Dec. 2006 Verbund plans to enter the Turkish electricity market, and has signed a joint venture agreement with Sabanci Holding. The partners are aiming for annual output of 30 TWh and a market share of at least 10% by 2015.

13 Dec. 2006 The European Commission threatens Austria and 15 other EU member states with proceedings before the European Court of Justice because of their failure to open their energy markets completely.

15 Dec. 2006 Austrian electricity consumers could have saved themselves €400m in the course of the year by switching to the cheapest supplier. Small businesses account for half of this total. Austrian Federal Chamber of Commerce president Christoph Leitl calls the electricity suppliers "robber barons".

16 Dec. 2006 Calls to the E-Control hotline are up by 26%.

21 Dec. 2006 The gas system charges are to be cut by an average of 4.5% on 1 January 2007. All the provinces except Tyrol will be affected.

27 Dec. 2006 Verbund is advertising the fourth position on its Managing Board. The favourite for the job is Christian Kern, the current CEO of Verbund-APT.



→ Orders and notices issued by E-Control and the Energy Control Commission

ELECTRICITY

Orders issued by E-Control

Electricity Intervention Data Order 2006

Energy Control Ltd order concerning the reporting of data required for the preparation of intervention measures for the purpose of safeguarding electricity supplies and of monitoring electricity-supply security, published in the official gazette supplement of the Wiener Zeitung on 28 December 2006.

Orders issued by the Energy Control Commission

System Charges Order 2006 (Amendment) Order 2007 (SNT-VO 2006 [Amendment] Order 2007)

Energy Control Commission order amending the Commission order determining the charges for system use (System Charges Order [SNT-VO] 2006), No. K SNT 100/06), published in the official gazette supplement of the Wiener Zeitung on 28 December 2006.

Notices issued by E-Control

Approval of the general terms and conditions of balancing-group coordinators	2
Approval of the general terms and conditions of balancing-group representatives	2
Approval of the general terms and conditions of the green-electricity settlement agent	1
Balancing-group representatives' licences	11
Equalisation payments	2
Stranded costs	3

Notices issued by the Energy Control Commission

Approval of the general terms and conditions for access to a distribution or transmission system	1
Arbitration proceedings	9
System-access-refusal hearings	3
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→ **Orders and notices issued by E-Control and the Energy Control Commission**

GAS

Orders issued by E-Control

Electricity Intervention Data Order 2006

Energy Control Ltd order concerning the reporting of data required for the preparation of intervention measures for the purpose of safeguarding natural-gas supplies and of monitoring gas-supply security, published in the official gazette supplement of the Wiener Zeitung on 28 December 2006.

Load Profile Order 2006

Energy Control Ltd. order concerning the assignment, preparation and adjustment of standardised load profiles (G SLP 12/06), published in the official gazette supplement of the Wiener Zeitung on 20 December 2006.

Transfer Order 2007

Energy Control Ltd. order concerning transfers of suppliers and balancing groups, posted on the E-Control website on 19 December 2006 and published in the official gazette supplement of the Wiener Zeitung on 20 December 2006.

Orders issued by the Energy Control Commission

1st Gas System Charges (Amendment) Order 2006 (GSNT-VO [Amendment] Order 2006)

Energy Control Commission order amending the Gas System Charges Order (GSNT-VO 2004) (No. K G 036/06a), published in the official gazette supplement of the Wiener Zeitung on 28 March 2006.

2nd Gas System Charges (Amendment) Order 2006 (GSNT-VO [Amendment] Order 2006)

Energy Control Commission order amending the Gas System Charges Order (GSNT-VO 2004) (No. K SNT G 001–043/06), published in the official gazette supplement of the Wiener Zeitung on 28 December 2006.

Gas Control Area Managers (Amendment) Order 2006

Energy Control Commission order amending the Commission order concerning control-area managers' charges (Nos. K SNT G 003/06, 134/06 and 136/06), published in the official gazette supplement of the Wiener Zeitung on 28 December 2006.

Energy Control Commission order amending Annexes 2 and 3 Natural Gas Act (No. FLA G 01/06), published in the official gazette supplement of the Wiener Zeitung on 28 December 2006.

Notices issued by E-Control

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Approval of the general terms and conditions of a balancing-group representative	1
Balancing-group representative's licence	1
Equalisation payments	2

Notices issued by the Energy Control Commission

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Approval of the BGR general terms and conditions of a control-area manager	1
Approval of the system general terms and conditions of a control-area manager	1
Approval of a control area manager's long-term plan	1
Appeals	2



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