

# Quarterly Report on European Electricity Markets



## ● MARKET OBSERVATORY FOR ENERGY

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The Director

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Dear readers,

This issue of the electricity reports covers the first quarter of 2009 – a period during which the effects of the financial turmoil were gradually spreading out to the real economy. Despite the slowing down of industrial production in the Member States which affected in its turn electricity consumption, market participants continued to trade actively on the European wholesale electricity markets. It seems that, for this period, the recession has not had a negative impact on liquidity – a very encouraging development if we compare it to the pullout of financial players triggered by the bankruptcy of Enron back in 2001.

The repercussions of the gas conflict between the Russian Federation and Ukraine unfolded in the cold January days. As the European Commission was coordinating a monitoring team of gas experts in both countries, more and more European citizens were convinced in the benefits of a common approach to energy security. The current issue of our electricity reports looks into a similar European initiative designed to facilitate the integration of the European energy market – the Baltic Energy Market Interconnection Plan.

The Market Observatory for Energy continues to expand the geographical coverage of the Quarterly reports. I am glad to inform you that the wholesale electricity market of Greece is now also covered by our market reports.

Enjoy your reading,

Yours sincerely,



Heinz Hilbrecht

## QUARTERLY REPORT ON EUROPEAN ELECTRICITY MARKETS

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### A. Recent developments in the electricity markets across Europe

#### A.1 Wholesale markets

The economic slowdown caused by the financial crisis in the second half of 2008 continued to affect the energy consumption of the Member States of the European Union throughout the first quarter of 2009.

Colder than normal meteorological conditions during the months of January and February 2009, together with the repercussions from the gas conflict between the Russian Federation and Ukraine in the beginning of the year, have significantly increased household electricity consumption, especially in the Eastern part of the EU.

EU 27 Heating Degree Days<sup>1</sup> during Q1  
Values for 2007, 2008, 2009 and 1980 – 2004  
average

	January	February	March
2007	453,47	438,64	354,26
2008	466,43	403,96	401,61
2009	555,66	476,36	406,00
LT avg	545,97	471,03	412,40

*Source : Eurostat / JRC*

<sup>1</sup> Heating degree days express the severity of the cold in a specific time period taking into consideration outdoor and room temperatures.

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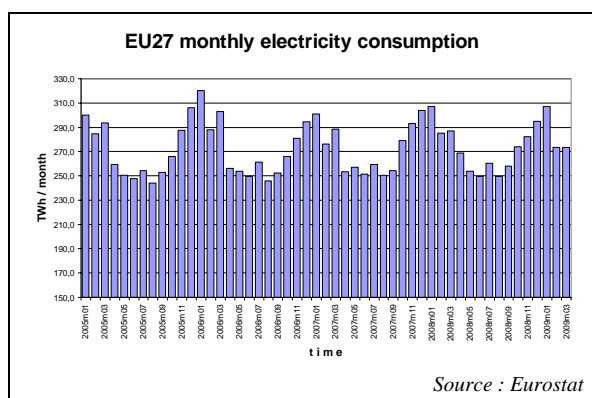
This report prepared by the Market Observatory for Energy of the European Commission aims at enhancing public access to information about electricity prices within the Members States of the European Union. Our goal is to keep this information timely and accurate. If errors are brought to our attention, we will try to correct them. However the Commission accepts no responsibility or liability whatsoever with regard to the information contained in this publication.

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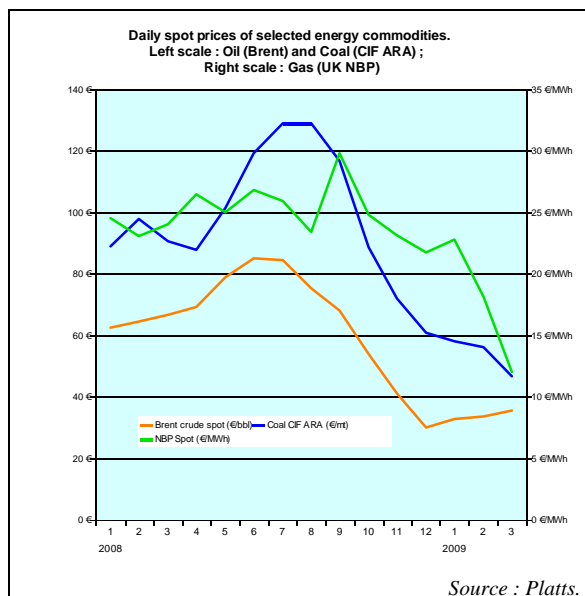
However, as industrial demand was receding, total electricity consumption in Q1 2009 was below the corresponding level of 2008.



Year-on-year, EU electricity consumption remained stable in January but fell by respectively 4% and 5% in February and March. Basically, all regions registered a reduction in total electricity consumption, with some of the bigger drops occurring in the UK and Ireland (-14% and -8% in March), and in the Nordic and the Baltic countries (both -7% in March).

By the end of 2008 the oil price has started to plateau. The average monthly spot price of the Brent, measured in € per barrel, actually increased by 8,4% in the period from January to March 2009.

During the same period, the average monthly spot prices for coal and especially for gas continued to slide downwards. The coal Amsterdam-Rotterdam-Antwerp contract and the National Balancing Point gas contract recorded drops of 20% and more than 47% respectively.



Compared to their peak values back in mid-2008, the average coal and gas prices contracted by 63% and 55% respectively, leaving an impression of accelerating drop for gas prices and of coal prices that were levelling off.

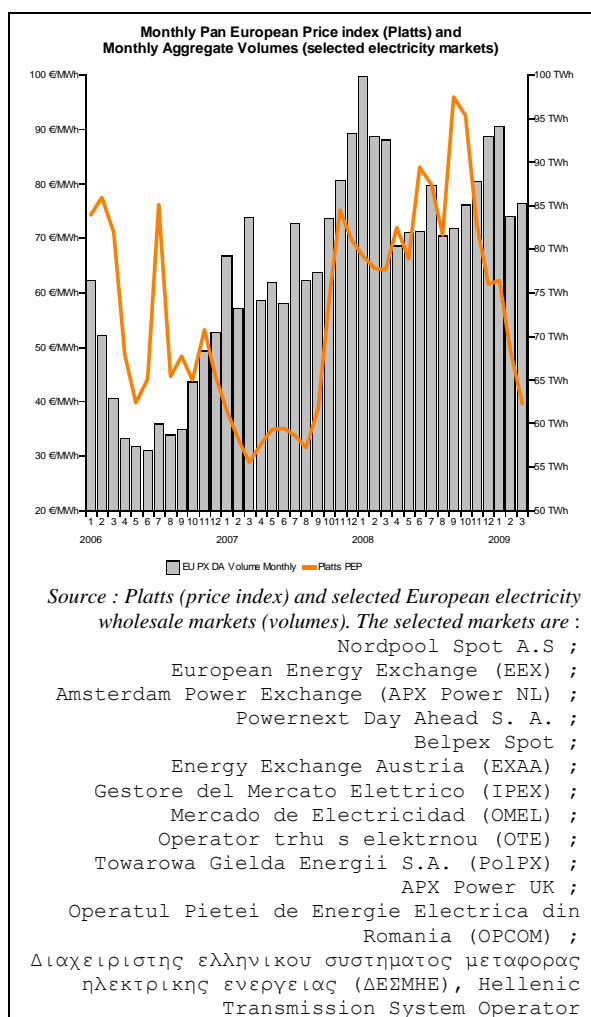
### A.1.1 Day ahead

#### EU wholesale markets

The combination of a significant price reduction in the main input fuels used by the marginal producers of electricity and a decreasing industrial demand in the majority of the Member States meant that wholesale electricity prices across Europe were bound to fall in the first quarter of 2009.

The average monthly value of the *Platts* Pan European Price Index (PEP) remained stable in January 2009, mainly due to the cold weather conditions in Europe. However, in February and March 2009 the

PEP index fell abruptly, recording a 36% drop in Q1 2009 alone.



Compared to its highest volume back in September 2008, the *Platts* index has lost more than half of its monthly average value (-58%).

Trading activity on the European electricity exchanges remained relatively stable. Year-on-year, the volume traded in January, February and March 2009 were respectively 5,7%, 9,9% and 7,9% less than the volumes of the corresponding months in 2008. The cumulative day-ahead

**volume** for the selected countries<sup>2</sup> stayed above 83 TWh per month between January and March 2009, suggesting that the lost volumes were roughly equivalent to the drop in industrial demand.

There was no evidence of mass retreat of capital on the exchanges similar to the flight-to-safety behavior observed in some of the financial markets. It seems that participants continued to rely on and use the electricity trading platforms throughout the bear market period.

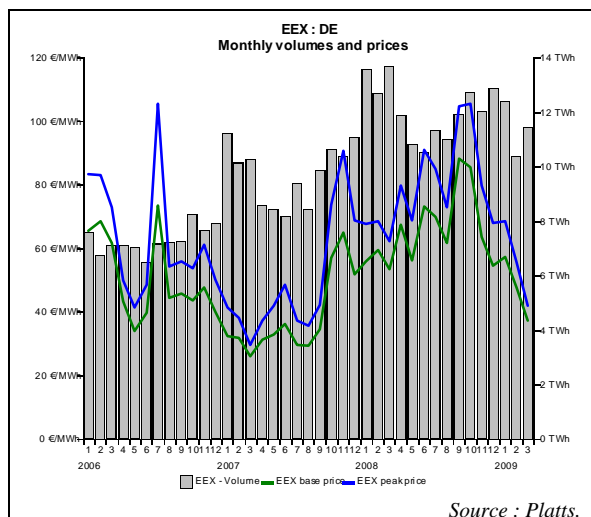
## Regional markets

### Central Western Europe

#### Germany

In 6 months German wholesale *baseload* and *peakload* prices went from the highest recorded values to levels comparable to the lows of the January – September period of 2007. From the start of Q4 2008 to the end of Q1 2009, base and peak prices fell by 60% each, with roughly half of this drop occurring in the months of February and March 2009.

<sup>2</sup> The *Quarterly Report* intends to cover all Member States, Candidate countries and countries from the European Economic Area that have developed a functioning wholesale market for electricity. For the time being, the selected countries are: Austria (AT), Belgium (BE), the Czech Republic (CZ), Denmark (DK), Finland (FI), France (FR), Germany (DE), Greece (GR), Italy (IT), the Netherlands (NL), Poland (PL), Romania (RO), Spain (ES), Sweden (SE), the United Kingdom (UK) and Norway (NO).



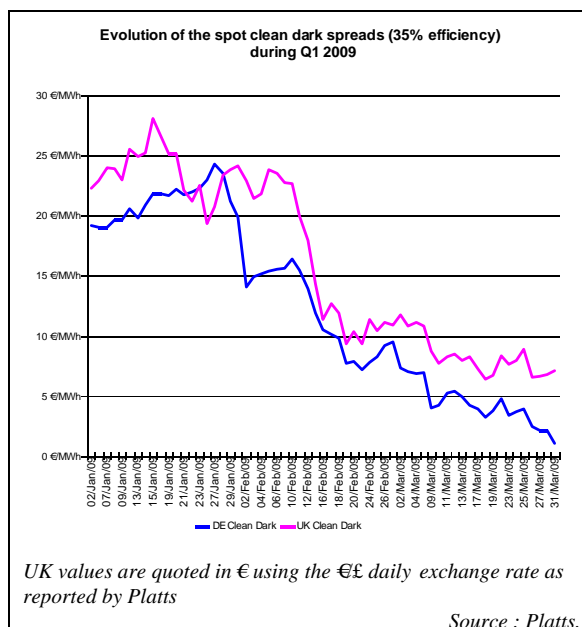
The month of January 2009 was associated with periods of unusually cold temperatures in Germany, with up to 180 – 200 heating degree days (HDDs) above January 2008 and 2007 values and 70 HDDs above the long term average.

The grid was ready for an increase in residential electricity consumption<sup>3</sup> and plant availability remained at normal levels. As a result, the average January base and peak prices stayed at levels recorded in December 2008.

During the first quarter of 2009, market participants were also factoring in information of falls in industrial production and industrial orders during the closing months of 2008 which were likely to result in less industrial demand for electricity.

As meteorological conditions gradually returned to normal and plant availability margins remained at comfortable levels, wholesale electricity prices continued their downward move in February and March 2009, driven by falling fuel prices and receding industrial demand.

<sup>3</sup> Electric heating is not widely used in Germany.



By the end of the observed period, the value of the clean dark spreads<sup>4</sup> was below the €5 /MWh line, implying that the drop of the spot price of electricity was steeper than the fall of the price of coal.

## The Netherlands

Traded volumes on the spot segment of the Amsterdam Power Exchange increased significantly during the first quarter of 2009. Compared to the same quarter in 2008, the energy exchanged on the day-

<sup>4</sup> Dark spreads are reported as indicative prices giving the average difference between the cost of coal delivered ex-ship and the power price. As such, they do not include operation, maintenance or transport costs. Spreads are defined for a coal-fired plant with 35 % efficiency.

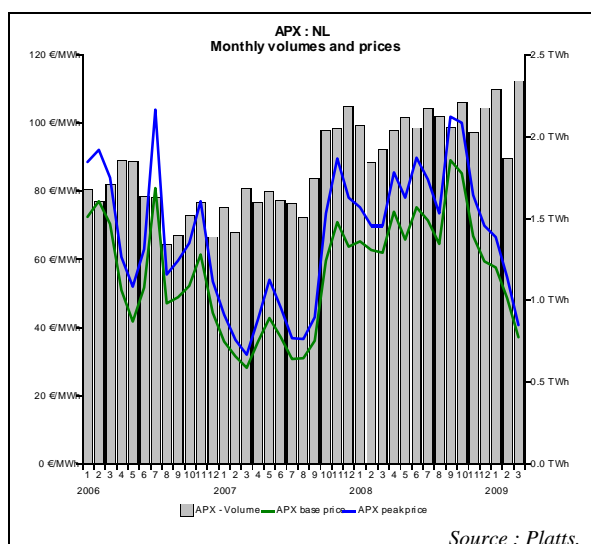
Dark spreads are given for UK and Germany, with the coal and power reference price as reported by Platts.

Clean dark spreads are defined as the average difference between the price of coal and carbon emission, and the equivalent price of electricity.



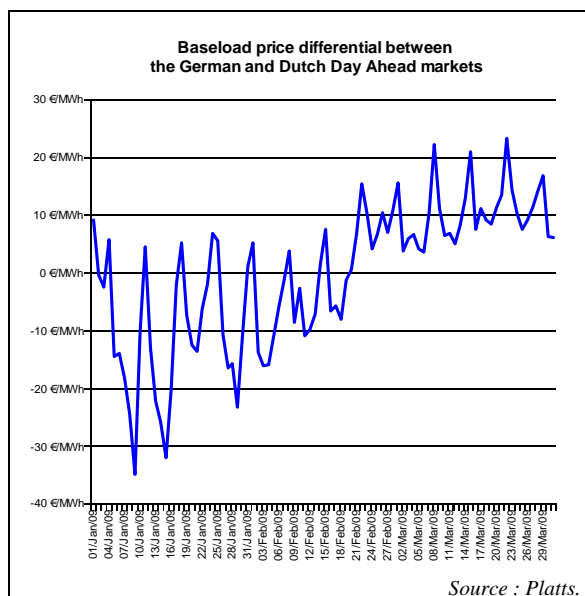
ahead market increased by more than 11%. In March 2009, APX has registered the highest monthly turnover. The aggregated day ahead volume has reached 2,35 TWh representing more than 20% of the Dutch electricity consumption.

As in other European market places, wholesale prices of electricity were in free fall throughout the observed period. The drops recorded for the monthly baseload and peakload prices in Q1 2009 alone were of respectively 35,8% and 38,8%.



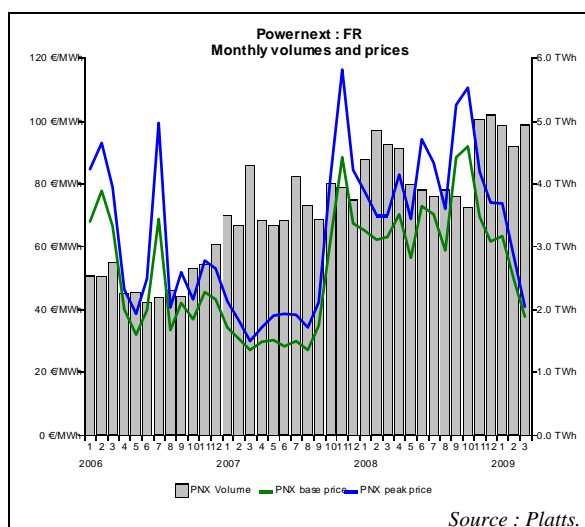
Wind conditions (strong in January and February and relatively weak in March), residential demand (strong in the cold days of January but then easing in February and March) and the state of the grid (with system availability margins being at comfortable levels) were among the drivers that shaped market behaviour, along with diminishing industrial demand.

At the beginning of the observed period, Dutch day-ahead contracts were traded at a premium to the German ones. Starting from mid February, the Dutch contracts became cheaper.



## France

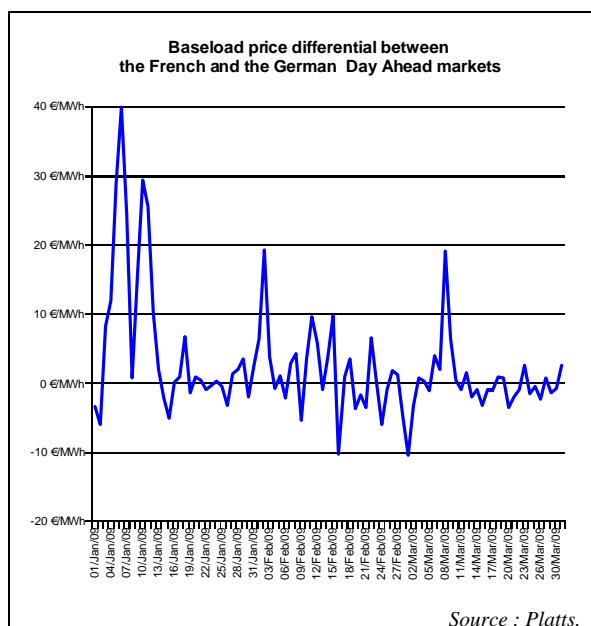
French traded volumes have also remained at high levels amounting to almost 5 TWh / month after the December 2008 record volume of 5,1 TWh.



In January 2009 France experienced a period of cold spell, with 50 HDD above

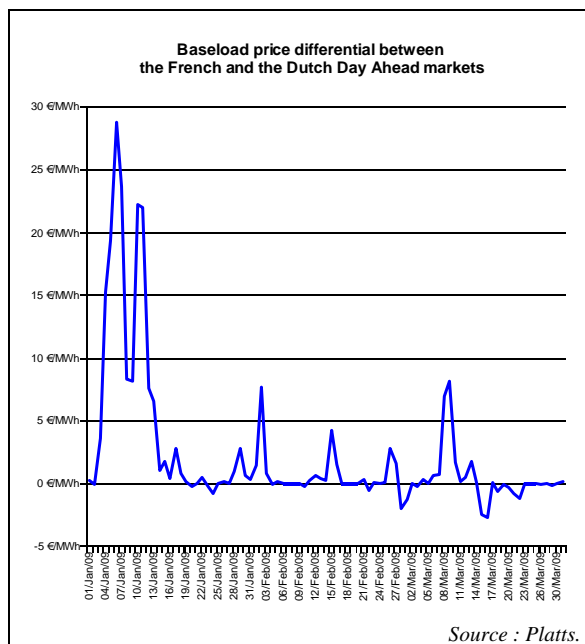
the average values<sup>5</sup>. This fuelled the residential demand for electricity as domestic consumers in France use relatively more electricity heating than elsewhere in the Central Western European region. On the other hand, industrial demand for electricity fell as French economy entered a period of recession.

As a result, wholesale prices remained stable in January 2009 with respect to the previous month: the baseload and peakload traded on average at respectively €63,2 / MWh and €73,7 / MWh. The bear sentiment took over again in February and March 2009 with average monthly prices falling by 20% and 40% on a yearly basis.



Gas generators were among the marginal producers of electricity at the beginning of the year. As concerns about the implications of the gas dispute between Russia and Ukraine were growing, French

contracts were traded at a high premium to the German and Dutch ones.



Plant availability was high, especially for the nuclear units, and the strong storms in southern France (end of January 2009) had only a minor impact on wholesale prices.

## Belgium

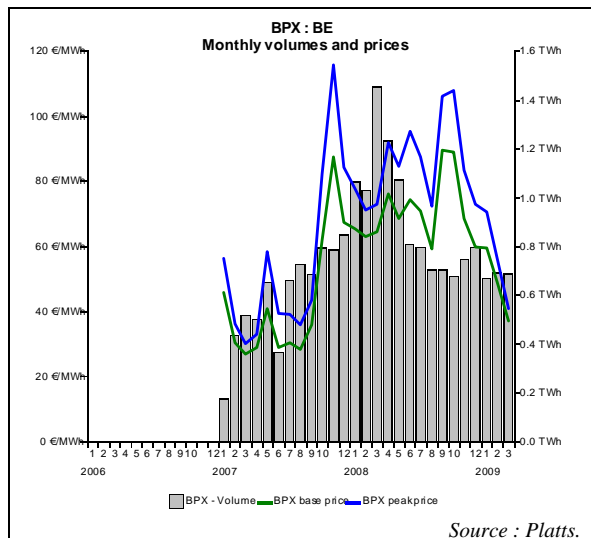
Volumes on the Belgian power exchange remained modest in the first quarter of 2009, with total transacted energy on the day ahead staying below 0,7 TWh / month. Unlike the winter months of 2007 / 2008, no increase in the trading activity was observed this time. As a result, compared to the volumes of the previous year, January, February and March 2009 totals were down by respectively 37%, 33% and even 53% on average.

The price developments were similar to the ones observed in France and the Netherlands: stable prices in January

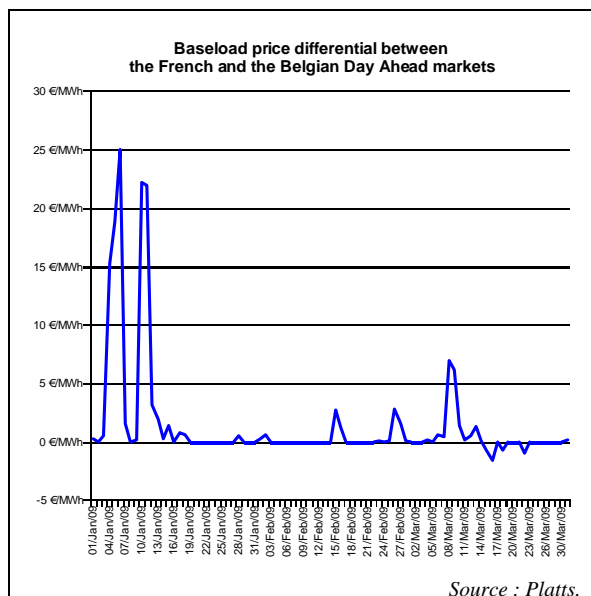
<sup>5</sup> In comparison, the month of January in 2008 and 2007 was relatively milder with 120 and 130 HDDs less than the 2009 levels.



combined with bear rallies in February and in March.

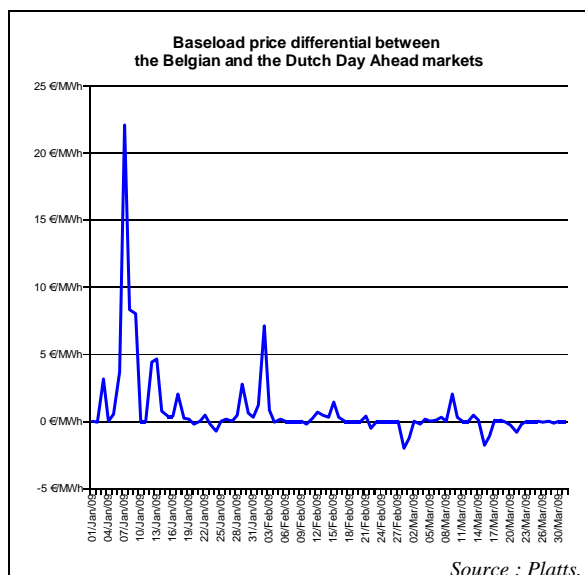


Barring the unusual price hikes in France at the beginning of the year, Belgian price differentials with respect to France and the Netherlands were relatively small, as expected in a functioning trilateral market coupling mechanism.



As a result, market operators seemed to favour transactions in Paris and in

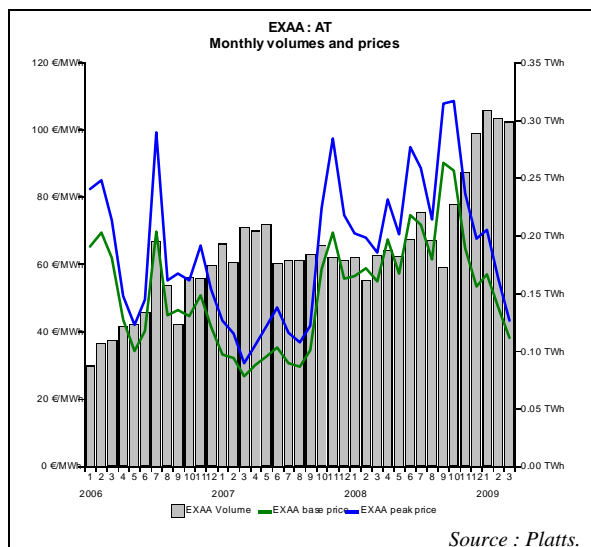
Amsterdam for their cross-border operations in the prices areas of France, Belgium and the Netherlands.



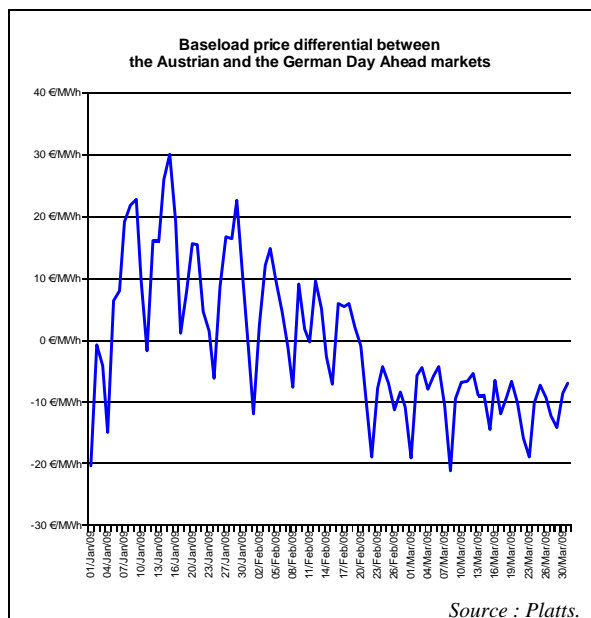
## Austria

Wholesale prices on the Austrian energy exchange (EXAA) continued to evolve closely to the prices of the Austrian price area of the European Energy Exchange. On an average monthly basis, baseload and peakload prices lost about a third of their value in the first quarter of 2009.

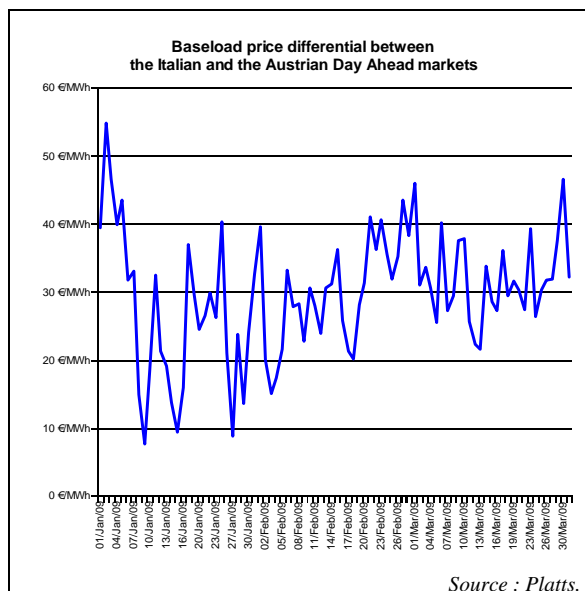
Trading activity has picked up, staying above 0,30 TWh / month. In January 2009 0,31 TWh of energy was exchanged, representing the highest value since the opening of EXAA.



It seems that the price differentials between Germany and Austria were influenced, among other things, by the hydro reserve levels in the Alpine region.

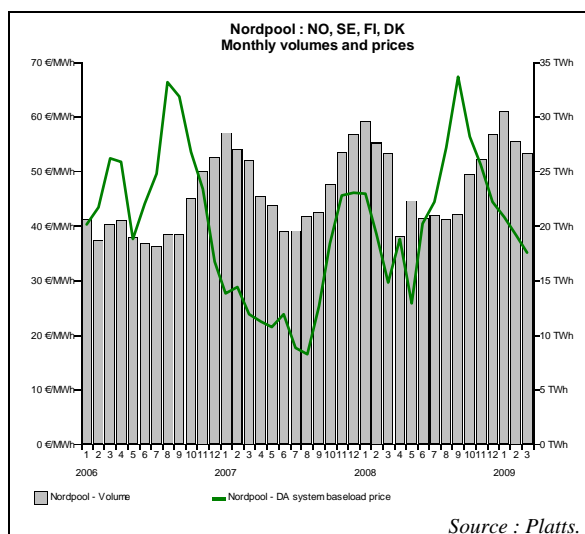


Compared to the Austrian prices, the Italian baseload was traded on average at a premium of almost €30 / MWh. Peakload contracts were offering even more interesting cross-border opportunities.



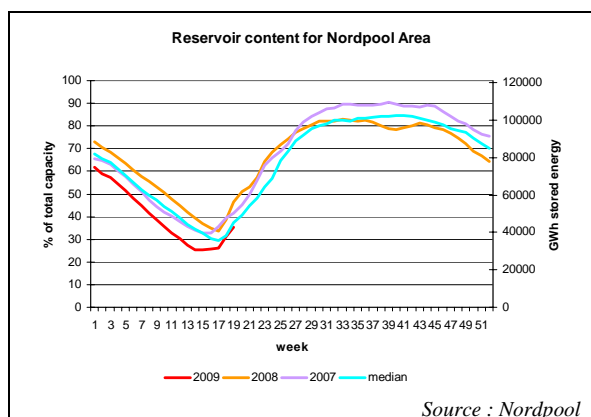
## Northern Europe

The monthly average baseload system price of the Nordpool area registered a sixth consecutive month of decreasing values. By the end of the observed period it reached price levels traded back at the beginning of 2008.



Consumers in the Nordic region continued to benefit from low prices in one of the most competitive wholesale electricity markets.

Compared to the power exchanges in the Central Western European region, the decrease was less severe: from January to March the average monthly baseload lost about 15% corresponding roughly to half of the drop experienced elsewhere.



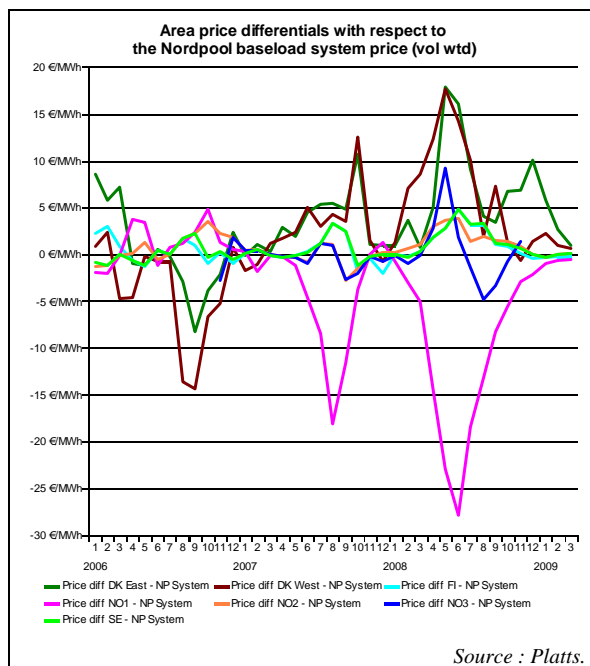
It seems that the shortening of industrial demand was partly matched by a negative shift in the supply side as hydro levels in Q1 2009 were approximately 10 % below the long term average levels as dry weather conditions prevailed in Scandinavia in the January – March 2009 period<sup>6</sup>.

Area prices at the beginning of 2009 have stayed close to the system price with Southern Norway being traditionally the region with the cheapest energy and the two Denmark regions being more expensive.

At the beginning of the observed period the NorNed cable connecting Norway to the Netherlands was disturbed for a brief

<sup>6</sup> There was also an increase of the residential electricity demand for heating.

period. Temporary transmission capacity restrictions were also put in place between Norway and Sweden due to a broken cable in Oslofjorden.



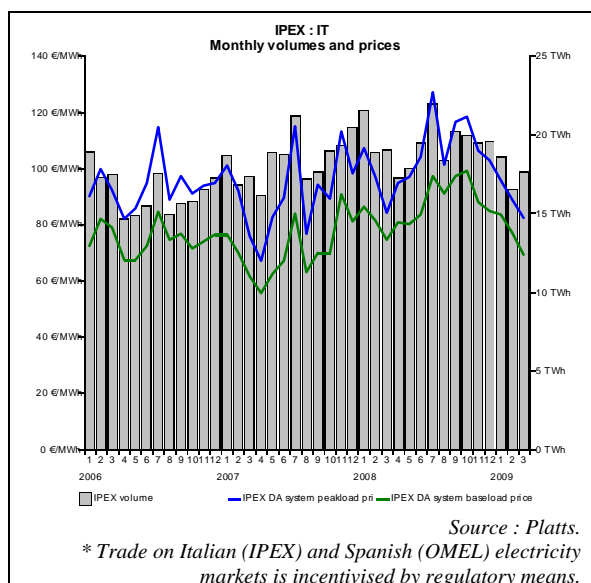
## Apenine peninsula

### Italy

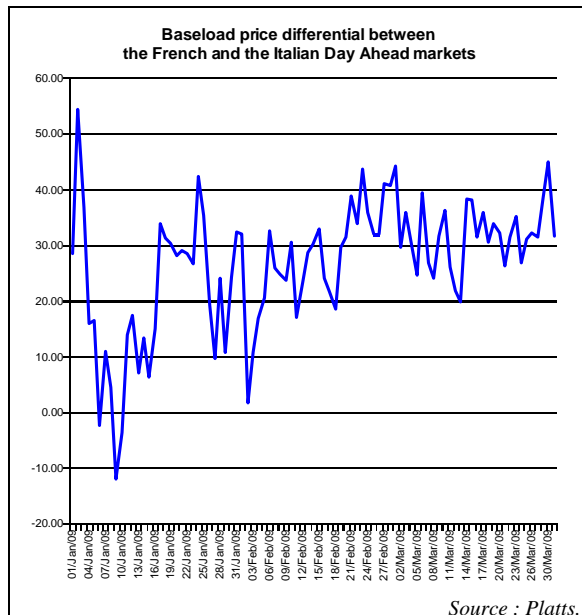
Compared to other places in Central Western Europe, the price drop in Italy during Q1 2009 was relatively modest. The peak and base prices receded by respectively 13.9% and 17.2%. While this price development seemed similar to that observed in the Nordic region, the order of magnitude in the prices of the two regions are quite different, Italy being one of the most expensive wholesale price area in Europe.

As trade on the IPEX - the Italian power market - is incentivised by regulatory means, the drop of industrial electricity demand could be traced more directly to the exchanged volumes in IPEX.

Year on year, the total monthly volume on the day ahead was down by 13,7%, 12,3% and 7,4% for the three months of Q1 2009.



Similar to the price differential with Austria, the Italian baseload contract was traded at a premium of approximately €30 / MWh to the corresponding French contract, offering good opportunities for cross-border trading.



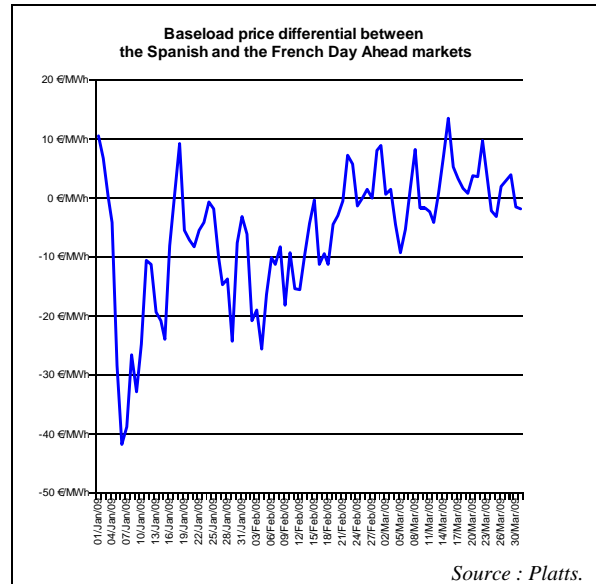
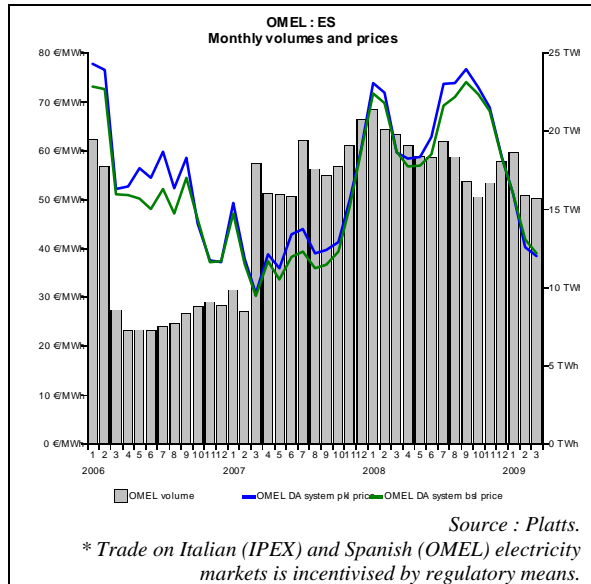
## Iberian peninsula

### Spain

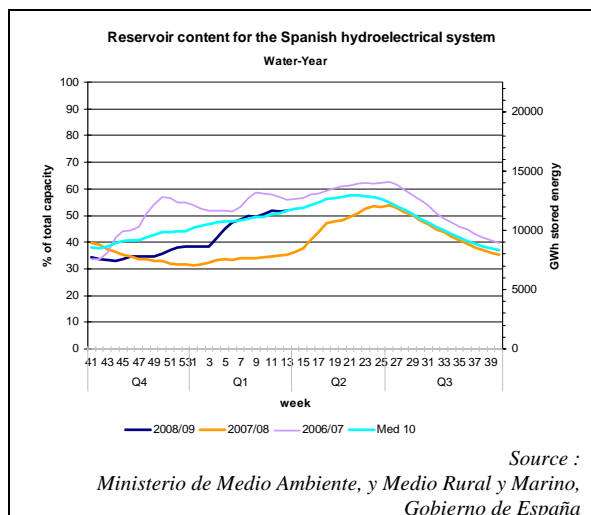
During the first months of 2009 market participants were bearish as information on the level of decline Spanish industrial production was reaching the market<sup>7</sup>.

Baseload and peakload prices declined steadily, with monthly recorded drops of 28,5% and 30,6% in January, 40,9% and 44,2% in February and 35,0% and 35,5% in March 2009. Curiously, the average monthly peakload price was **below** the corresponding baseload price in February and March.

<sup>7</sup> Down 17,2% and 19,6% in November and December 2009.



Grid margins were comfortable as hydro, nuclear and wind generators were on line. Hydro reserves were in the range of normal seasonal values and as February was a relatively windy month, electricity supply was abundant.



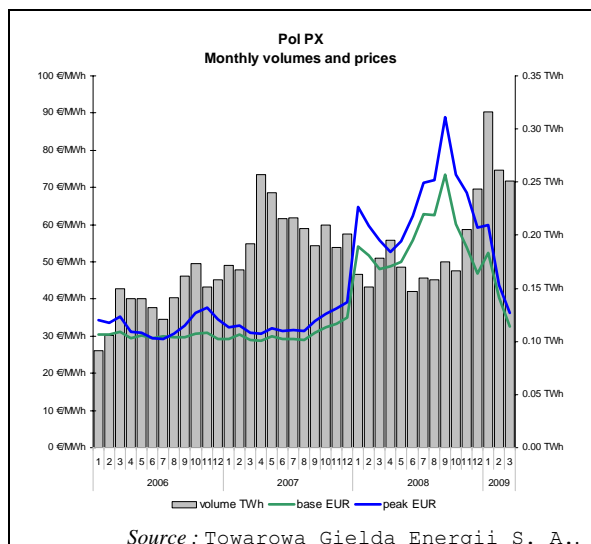
As a result, the Spanish premium with respect to the French baseload contract was decreasing by the end of the observed period.

## Central Eastern Europe

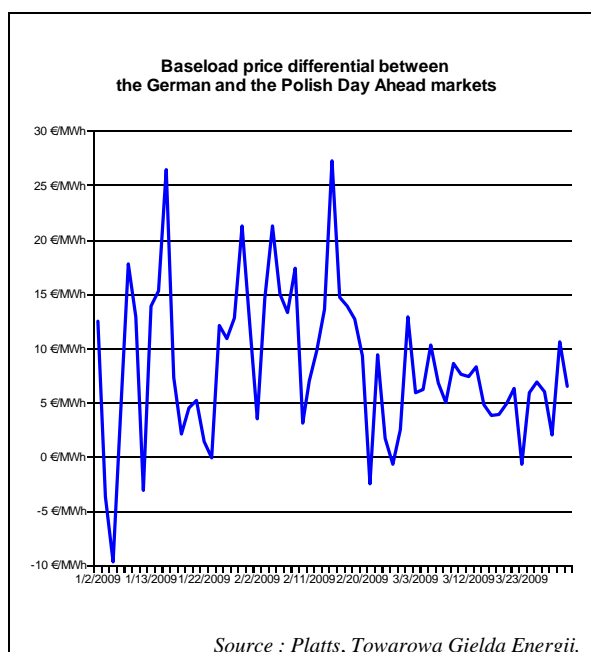
### Poland

In January 2009 a record volume of 0,32 TWh / month was traded on the Polish power exchange.

The combination of falling coal prices and decreasing industrial demand for electricity has oriented Polish prices downwards. During Q1 2009 the baseload and peakload prices fell by about 40%, most of the drop occurring in February and March as January prices remained at December levels as a result of the cold spell.

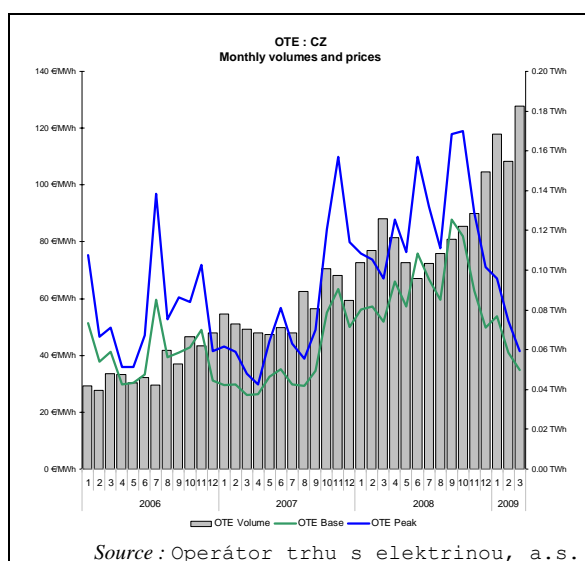


With respect to the German baseload price, the Polish equivalent was traded at an average discount of €5 – 10 / MWh.



## Czech republic

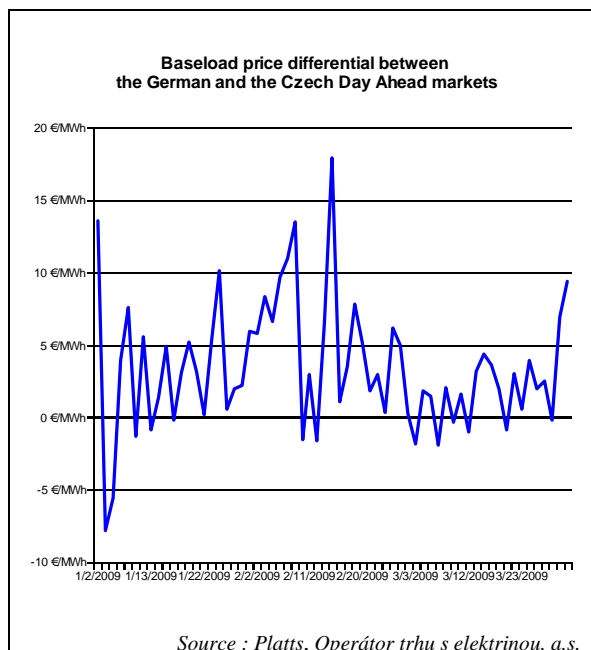
Volumes of the Czech power exchange continued to grow steadily, with new highs of 0,17 TWh / month and 0,18 TWh / month being reached respectively in January and March 2009.



Czech prices were followed closely German prices, keeping an average discount of €3 – 5 / MWh.

Compared to the September 2008 highs, the Czech base and peak prices were reduced by respectively 60% and 64%.





## British Isles

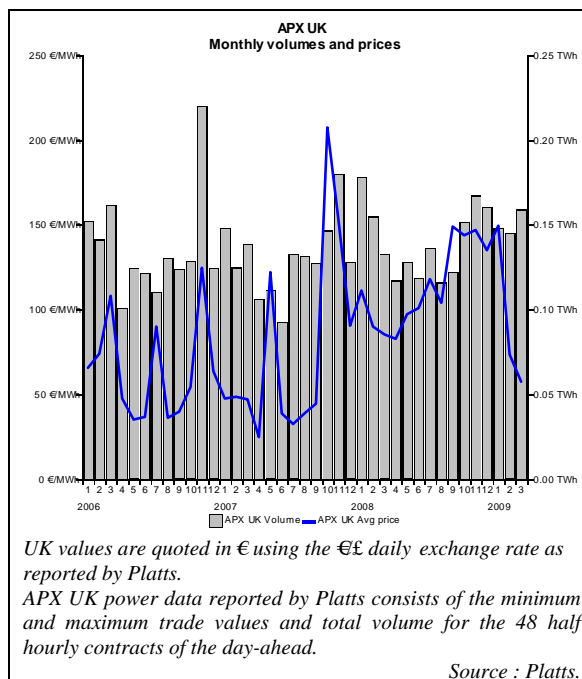
### UK

Compared to traded volumes in the Central Western European region, the amount of energy exchanged on the UK day ahead market continued to remain modest, in the range of 0,14 – 0,16 TWh / month. Even after including energy traded over the counter, UK wholesale market liquidity remains low, as indicated by a recent report of the House of Commons<sup>8</sup>.

The UK regulator Ofgem has also started work with the six large distributing companies to identify the causes of low wholesale market liquidity.

<sup>8</sup>

<http://www.publications.parliament.uk/pa/cm200708/cmselect/cmberr/293/293i.pdf>

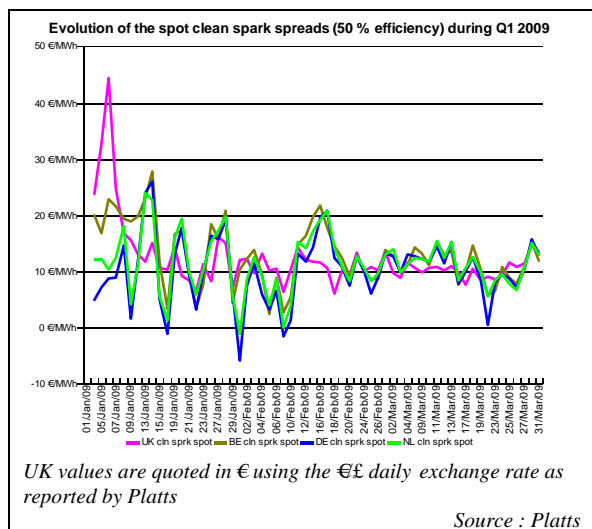


The APX UK monthly average baseload price contracted by more than 60% in the first quarter of 2009 to levels last seen in 2007.

Grid margins were improving in January so the impact of the cold weather on day ahead prices was not significant. Barring the staring days of January, gas and electricity prices were moving in the same direction. As a result, the clean spark spreads<sup>9</sup> remained in the range of € 10 / MWh.

<sup>9</sup> Spark spreads are indicative prices showing the average difference between the cost of gas delivered on the gas transmission system and the power price. As such, they do not include operation, maintenance or transport costs. The spark spreads are calculated for gas-fired plants with standard efficiencies of 50% and 60%. This report uses the 50% efficiency. Spreads are quoted for the UK, German and Benelux markets.

Clean spark spreads are defined as the average difference between the cost of gas and emissions, and the equivalent price of electricity.

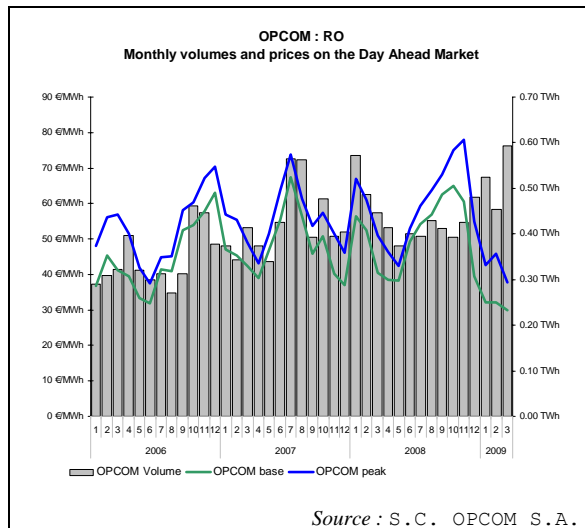


## South Eastern Europe

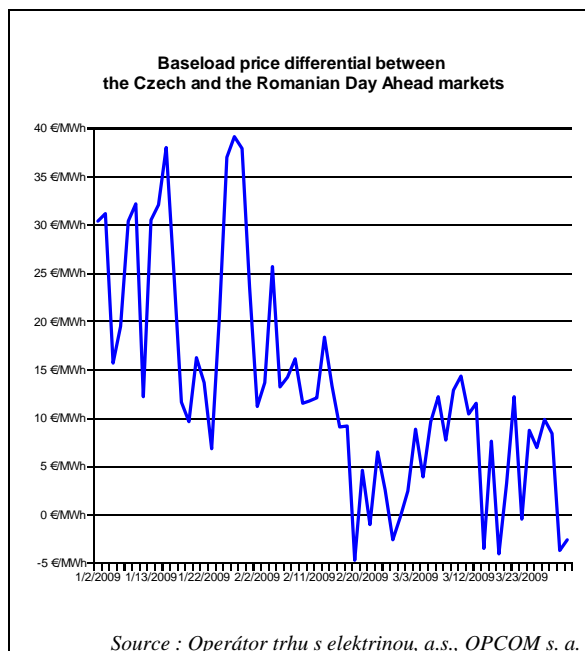
### Romania

Wholesale electricity prices in Romania remained relatively stable in the first quarter of 2009, with the baseload and peakload day ahead contracts falling by respectively 6,8% and 11,9%. To observe lower monthly values for base and peakloads, one needs to go back to August 2005.

March 2009 was a record-month with volumes in the OPCOM day ahead segment reaching almost 0,60 TWh / month.

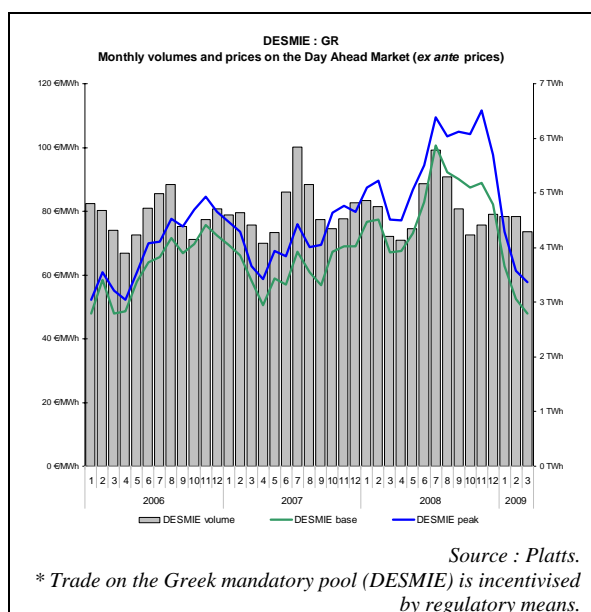


The price differential between the Czech and the Romanian baseload contract decreased throughout Q1 2009, with premiums going down from €20 / MWh on average in January to €5 / MWh in March.



## Greece

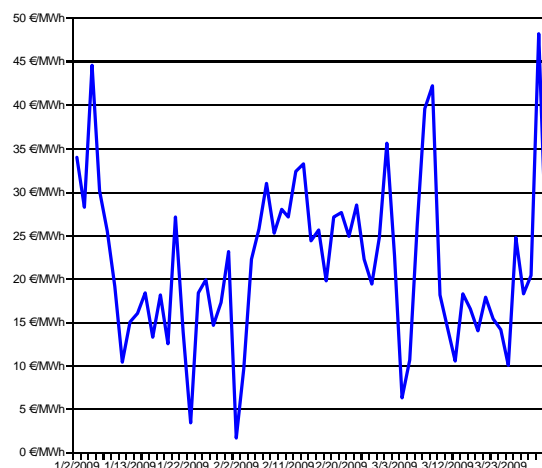
Exchanged volumes on the Greek electricity pool remained stable in Q1 2009 to levels comparable to the previous winter season.



The *ex-ante* (day ahead) prices were following the decrease of the coal benchmark price. The monthly average baseload price went from €100 / MWh in June 2008 to €47,9 / MWh in March 2009.

On average, for the period January – March 2009 the Italian baseload was traded at € 20 / MWh higher than the Greek equivalent.

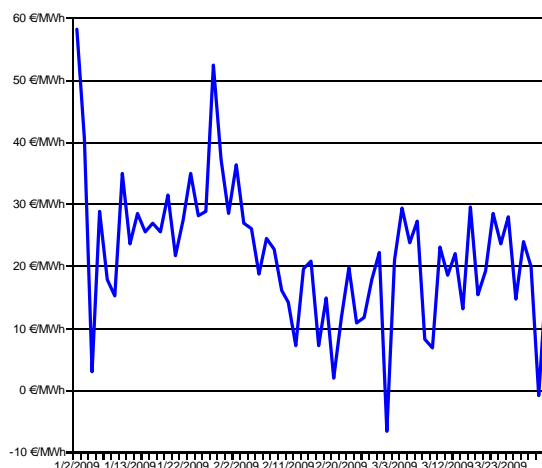
Baseload price differential between the Italian and the Greek Day Ahead markets



Source : IPEX, DESMIE.

With respect to the Romanian baseload however, the Greek contract was traded at a €20 / MWh premium in Q1 2009.

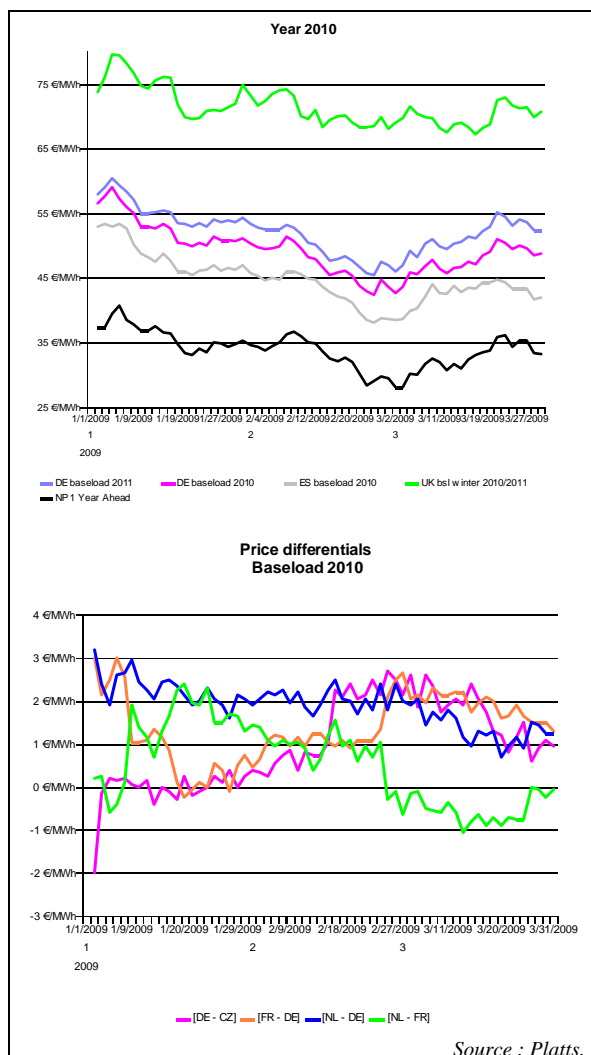
Baseload price differential between the Greek and the Romanian Day Ahead markets



Source : DESMIE, OPCOM s.a.

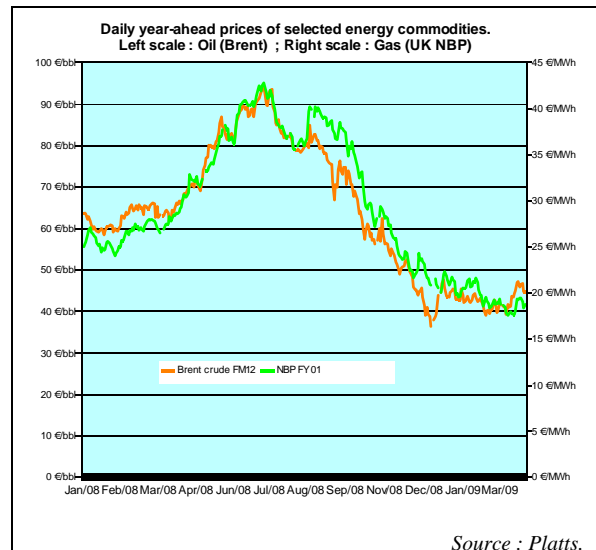
### A.1.2 Forward markets

During the first quarter of 2009 the yearly forward contracts on the European power exchanges continued to follow a familiar pattern of the UK winter contract being traded at a €20 – 30 / MWh premium, the Spanish calendar at a €10 / MWh discount and the Nordic year ahead at a €20 / MWh discount to the German calendar contract. At the same time the range between the German, Dutch, French and the Czech contracts was small, with the Dutch – French spread decreasing by the end of the observed period.

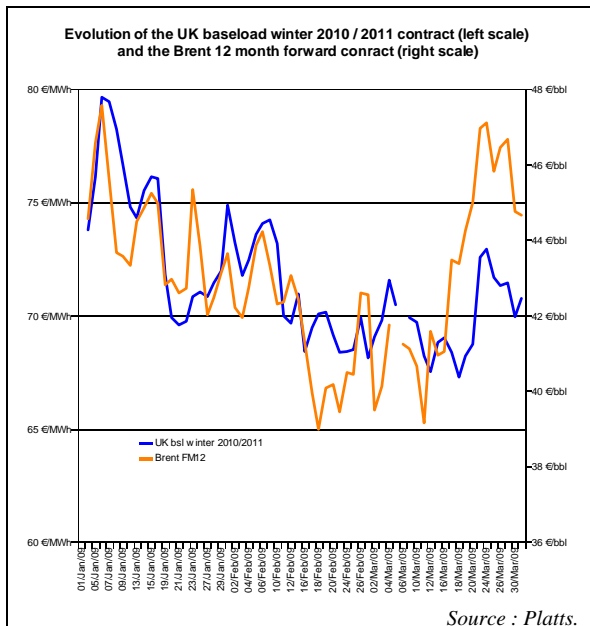


Like the spot prices, forward prices gradually fell. However, forward contracts lost on average less value than their day ahead peers. Market operators were uncertain of the duration of the economic slowdown, and so they were in general less prone to selling rallies.

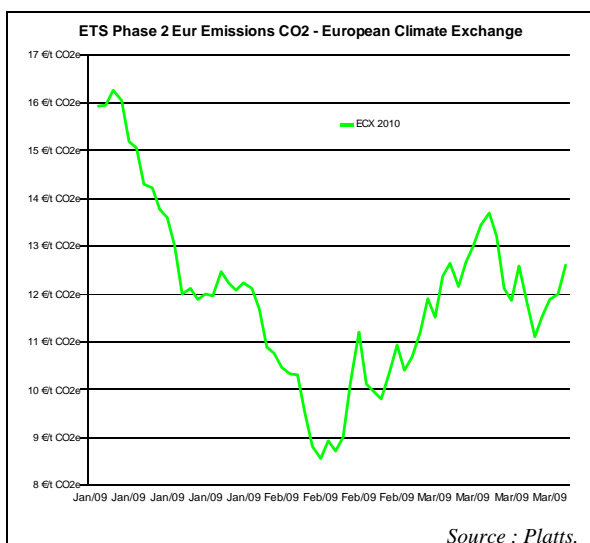
It seems that the German curve remained correlated to coal prices while the UK curve was sensitive to oil and gas prices.



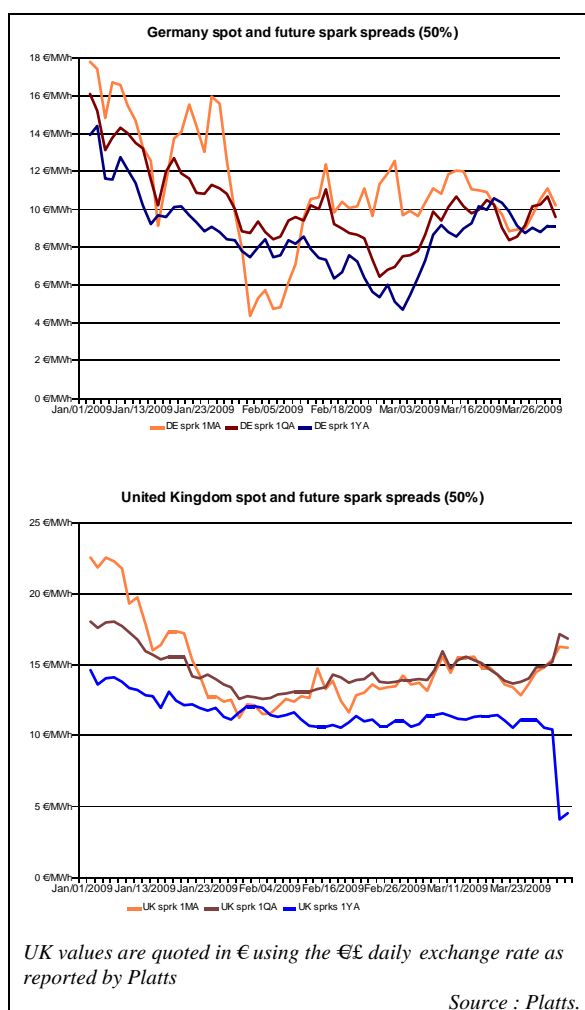
Indicators of economic activity were also among the drivers that influenced the prices of European forward contracts.



On the 12th of February 2009 the price of the 2010 European Climate Exchange contract hit a low of € 8,55 / tCO<sub>2</sub> as market participants reacted to expectations of falling emissions in Europe resulting from the economic recession. By the end of the observed period carbon prices had recovered only partially to about € 12 / tCO<sub>2</sub>.



The values of the year ahead spark spread in Germany kept within a range of €6 – 10 / MWh for most of the first quarter of 2009. The corresponding volumes for the UK market were slightly higher as the German long term gas price was relatively cheaper than the UK NBP hub price in Q1 2009.

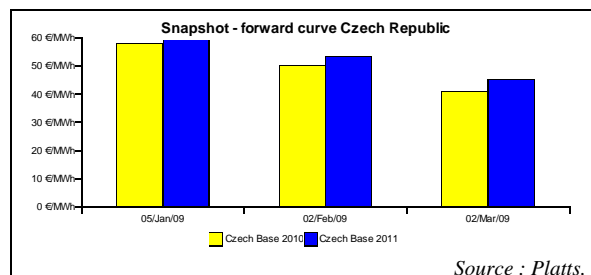
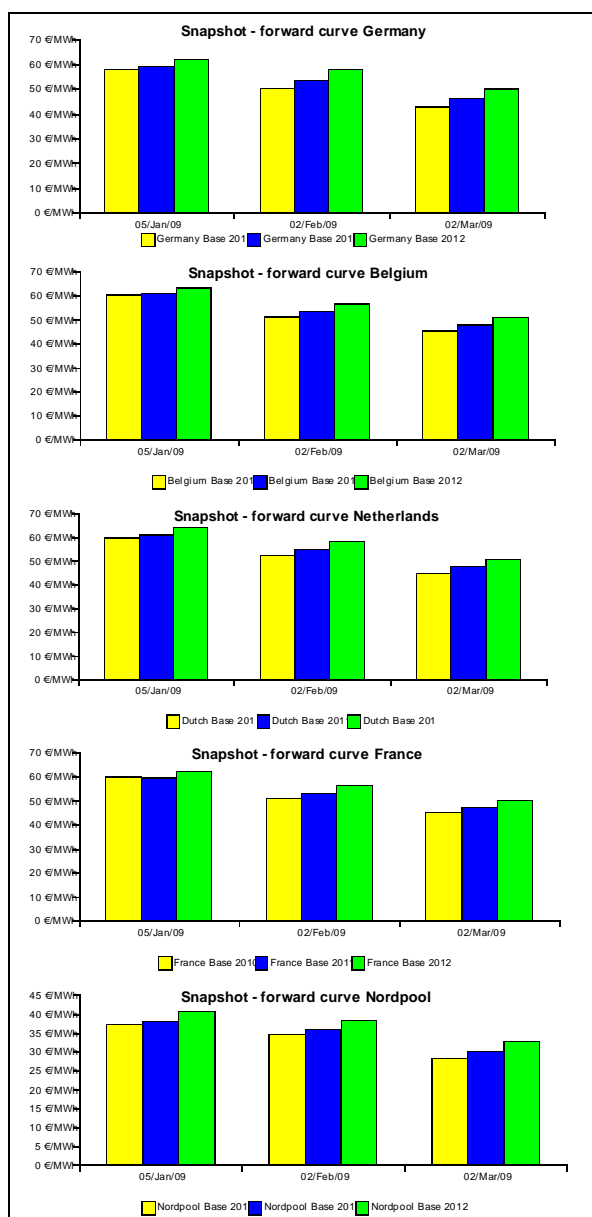


Throughout Europe, the forward electricity curves were in contango<sup>10</sup> as market participants were expecting higher

<sup>10</sup> A situation of contango arises when the closer to maturity contract has a lower price than the contract which is longer to maturity on the forward curve.

electricity prices beyond the period of economic slowdown.

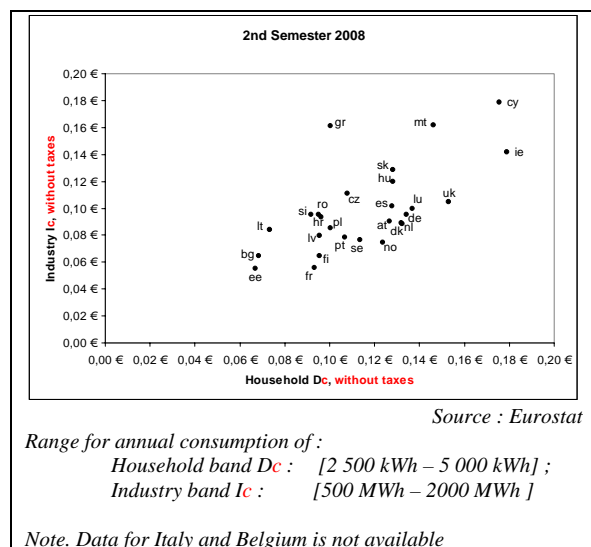
At the same time, as the observed period was drawing to an end, spot and forward electricity prices continued their downward movement.



## A.2 Retail markets

### A.2.1 Prices by Member state

Contrary to the falling wholesale prices in Q4 2008 and Q1 2009, the majority of retail prices (**without taxes**) for the median household and industrial consumers<sup>11</sup> in the Member States registered increases, the exceptions being Luxembourg (-3,6%) and Portugal (-24,4%) for households and France (-4,9%) and Portugal (-12,7%) for industrial consumers.



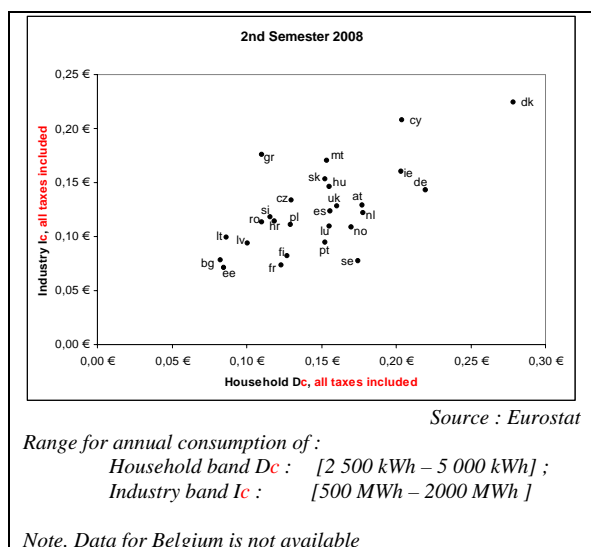
Some of the Member and Candidate States with the highest price increases for domestic users included Malta (+54,8%), Croatia (+20,3%), Latvia (+19,2%) and

<sup>11</sup> Groups Dc and Ic respectively.



Bulgaria (+15,5%). The member states with the most notable increases for industrial consumers were Greece (+87,1%), Malta (+32,6%) and Cyprus (+27,1%).

Once all taxes are factored in the electricity bill, prices in Portugal actually increased while movements and relative order of magnitudes in the other Member States were unchanged.

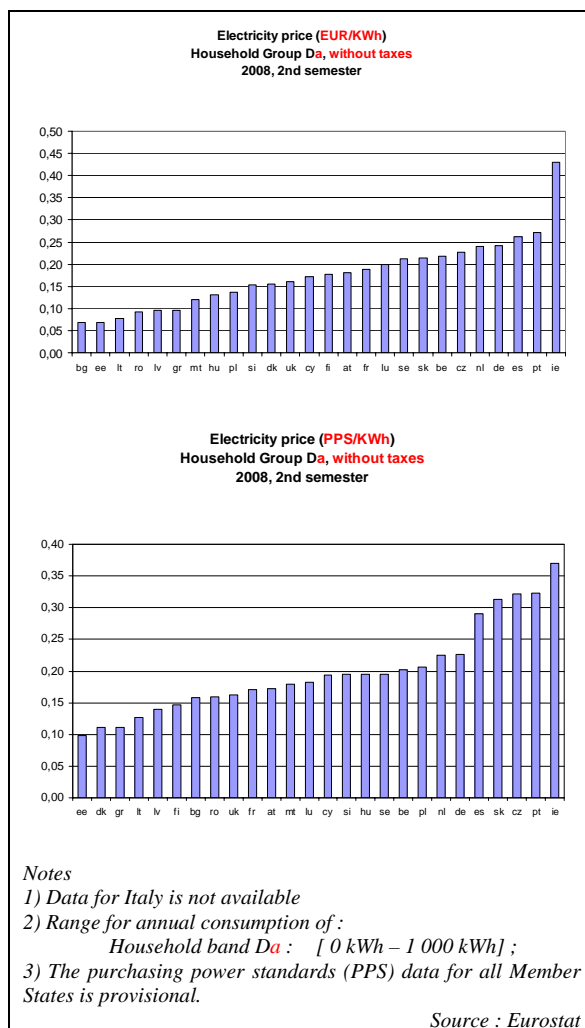


### A.2.2 Cross-panel data on household electricity consumption

Turning to the prices (without taxes) paid by the most vulnerable household consumers, the familiar reordering of the rankings of the Member States emerges with regard to the monetary measure used.

Whereas the € / kWh measure tends to place New Member States from Eastern Europe to the left of the scale, the PPS /

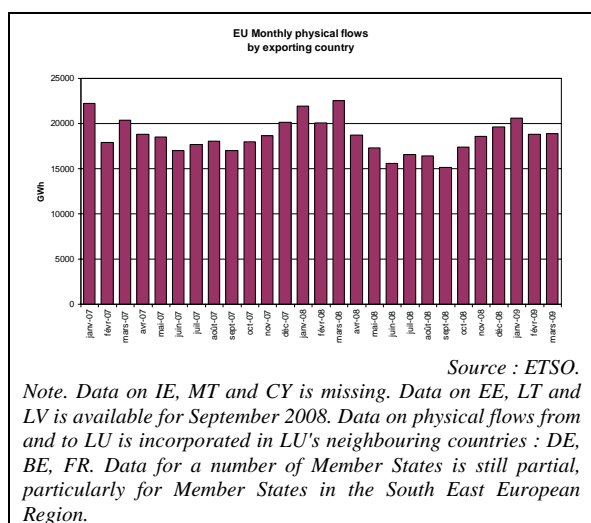
kWh measure reveals that among the cheapest Member States are countries such as Greece, Denmark, Finland and the UK.



## B. Building the internal market for electricity: cross border flows and trade

Cross border energy flows across the European regions decreased in the first months of 2009 as the recession impacted electricity demand and as domestic sources were preferred to imports in some of the Member States. Year-on-year aggregate EU level falls in January, February and March were -6%, -6% and -16% respectively.

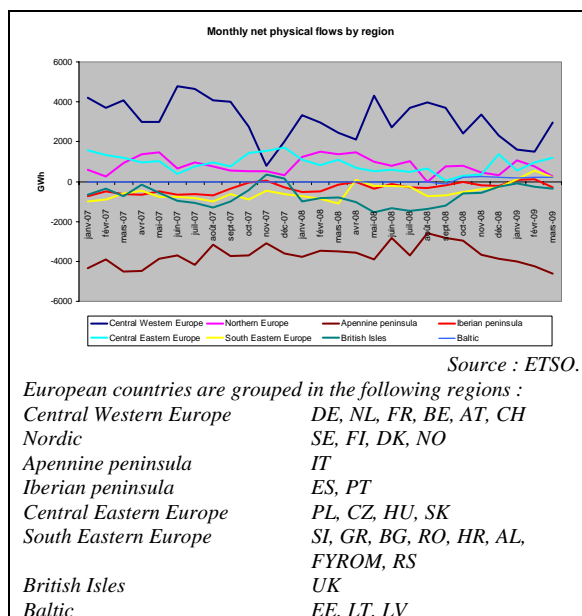
The regions with the largest falls in exported energy for those three months were Central Western Europe (-18%, -15% and -13%), Northern Europe (-2%, -18% and -31%) and Central Eastern Europe (-11%, -10% and -24%). On the other hand, the countries from the South Eastern European region have significantly increased their exports in and out of the region<sup>12</sup>.



Exports from Ukraine increased in January (+23,4%), remained stable in February (+2%) and fell strongly in March (-30,5%).

Looking at the net positions of the European regions regarding physical flows, it seems that the electricity balance of Italy has deteriorated from – 2,6 TWh / month in August 2008 to – 4,6 TWh / month in March 2009. However, the price differential with the neighbouring Member States has remained stable<sup>13</sup>.

Another interesting development in Q1 2009 was the improving net exporting positions of the Central Western European and the Central Eastern European regions while the Nordic and the Southern regions became more balanced.



<sup>12</sup> For the three months of Q1 2009 the cumulative increase of the exports was +69%, +125% and +44% respectively.

<sup>13</sup> See part A1 of the current report.

### ***C. "Focus on the Baltic energy market interconnection plan (BEMIP) "***

Estonia, Latvia and Lithuania may face challenges in the energy sector in the coming months, as the Lithuanian nuclear power station Ignalina is programmed for decommissioning by the end of the current year. The European Commission considers physical and institutional integration into the European energy market the right approach to tackle energy security. To that end, an open and transparent common Baltic electricity market and its integration with the Nordic electricity market must be supported by the necessary infrastructures. The eight Baltic Sea Member States Denmark, Estonia, Finland, Germany, Latvia, Lithuania, Poland and Sweden signed a Memorandum of Understanding on the Baltic Energy Market Interconnection Plan (BEMIP) with European Commission President, José Manuel Barroso. The signature of the Memorandum launches the implementation of an action plan to make the common Baltic market and its integration to the Nordic market a reality by 2015.

Several of the proposed BEMIP infrastructure projects are part of the European Energy Programme for Recovery (EEPR). This potentially amounts to more than half a billion euros as additional support for the energy infrastructure projects in this region. The EEPR comes on top of existing financial support from the EU, such as the cohesion fund, the TEN-E programme and others.

With regard to electricity, the BEMIP covers the following areas:

#### ***Electricity interconnections and generation***

The infrastructure projects allowing the integration of the Baltic Sea Region electricity markets can be grouped into three sets of projects:

- a) *The Nordic Master Plan* covers projects such as Fenno - Skan II linking Finland and Sweden, Great Belt in Denmark, Nea - Järpströmmen between Sweden and Norway, South Link in Sweden and Skagerrak IV between Denmark and Norway, among others.
- b) The interconnection projects linking the *Baltic area with the Nordic countries and Poland* - NordBalt (previously called SwedLit) linking Sweden to Lithuania, Estlink 2 - between Estonia and Finland and LitPol between Poland and Lithuania - are commercially viable.
- c) *The interconnections between Poland and Germany* form the third set of projects. One of the drivers behind these - as opposed to mainly market integration rationale for the above projects - is the loopflows caused by wind generation in Northern Germany.

### ***Electricity market integration***

The electricity market design shall be consistent with the key elements of the Nordic market design, while keeping full compliance with the EU Directive 2003/54/EC and the Regulation 1228/2003, including in the transitional phase from the present power exchange situation to the final Baltic integrated power market. In a first stage, the power exchange will cover only the day-ahead market and, thereafter, on the basis of the acquired experience from the day-ahead market, further markets could be introduced in the power exchange, namely intraday and financial markets. Initially, physical bilateral contracts will be allowed only inside each bidding area, while financial bilateral contracts may be established also across different bidding areas.

A specific "Roadmap" that describes practical steps on how to reach the new market model and which aims at removing the barriers for a regional electricity market in the Baltic States in conformity with the EU internal electricity market rules has been proposed, as follows:

The first step requires the endorsement to start the Baltic market integration by relevant authorities. The second step involves the fulfilment of the market opening requirements (e.g. removal of regulated tariffs, gradually phasing out subsidies along all the relevant parts of the value chain, separation of TSO activities and roles, removal of cross-border restrictions, establishment of market based congestion management). The third step covers fine tuning of the functioning of the market (such as common reserves and balancing power market). The last step to be finalized within the next 3-5 years would enable a fully functioning Baltic electricity market integrated with the Nordic market implying a full opening of the retail market and the establishment of a common power exchange for physical trade in the Nordic and Baltic area.