

Please note that this PDF is subject to specific restrictions that limit its use and distribution. The terms and conditions are available online at <http://www.iea.org/t&c>

ELECTRICITY INFORMATION

2015



International
Energy Agency

Secure • Sustainable • Together

RECENT ELECTRICITY TRENDS

Production

In 2014, gross electricity production in OECD countries fell by 0.8%. This was mainly the result of a decrease in electricity production from fossil fuels, notably oil (-17.1%), brown coal (-3.4%) and natural gas (-1.2%) ordered by decreasing importance in absolute values. On the other hand, electricity generation from wind (+8.1%), nuclear (+0.9%) and solar photovoltaic (PV) (+26.9%) increased.

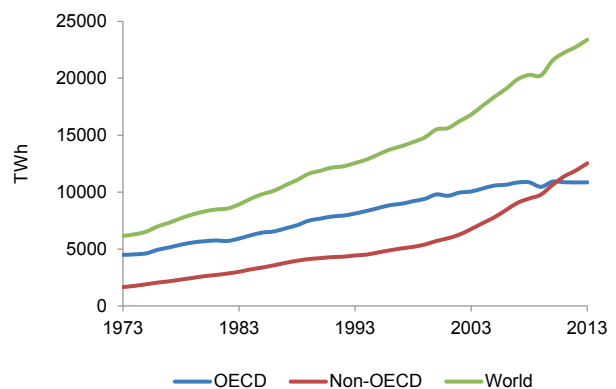
Total OECD electricity production in 2014 was lower than its 2007 level.

Nuclear electricity production increased in 2014 for the second year in a row after the accident at the Fukushima plant in Japan in 2011. However, Japan nuclear electricity production reached zero in October 2013 and, as of publication, no nuclear plant started operation under new regulations.

From 1973 to 2013, world gross electricity production increased from 6 144 TWh to 23 391 TWh, an average annual growth rate of 3.4%. Compared to the 22 740 TWh produced in 2012, global power production in 2013 increased (2.9%) for a fourth year in a row after the economic crisis in OECD countries led to a visible decline in global production in 2008 and 2009.

The increasing share of non-OECD countries in total world electricity production reflects the higher average growth rate which has prevailed since 1973. In the last 40 years, electricity production increased at an average annual rate of 5.2% in non-OECD countries, while in OECD countries the average annual growth rate during the same period was 2.2%. Indeed, in 2011 non-OECD electricity production surpassed OECD production for the first time.

Figure 1: Total Electricity production



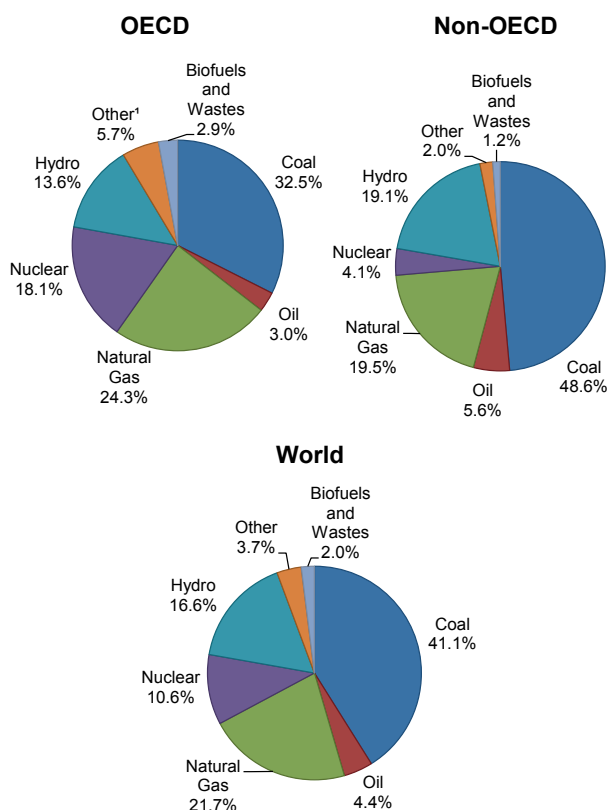
In 2013, 67.2% of world electricity production was from fossil fuel-powered plants. Hydroelectric plants provided 16.6%, nuclear plants 10.6%, biofuels and waste 2.0%, and geothermal, solar, wind and other sources made up the remainder.

OECD production

Gross electricity production in 2014 in OECD countries (including generation from pumped storage plants) was 10 773 TWh, a decrease of 0.8% from the 2013 level and 1.4% lower than the level in 2010.

Nuclear plants accounted for 18.4% of total gross electricity production, hydroelectric plants 13.5%, total combustible fuel¹ plants 61.4% (made up of 58.7% from fossil-fuel-fired plants and 3.0% from biofuels and waste plants) and geothermal, solar, wind and other plants 6.4%.

1. Combustible fuels refer to fuel that are capable of igniting or burning, i.e. reacting with oxygen to produce a significant rise in temperature. Fuels included are: coal and coal products, oil and oil products, natural gas, and biofuels and waste including solid biomass and animal products, gas/liquids from biomass, industrial waste and municipal waste.

Figure 2: 2013 fuel shares in electricity production

Non-OECD production

While complete statistics are not available for electricity production in all non-OECD countries for 2014, comprehensive data are available for 2013. Gross electricity production in 2013 in non-OECD countries was 12 533 TWh, an increase of 5.4% from the 2012 level, in contrast to a small 0.1% increase in the gross production of the OECD countries from 2012 to 2013.

In 2013, 73.8% of non-OECD electricity production was generated from fossil fuels, 19.0% was provided by hydroelectric plants, 4.1% by nuclear plants and 3.1% by biofuels and waste and geothermal/solar/wind capacity.

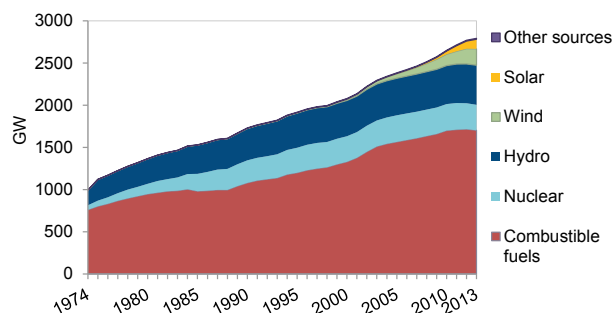
Capacity

Capacity data are available only for OECD countries.

In 2013, OECD countries reported 2 794 GW of total installed capacity, a 0.8% increase from 2012. This consisted of 1 704 GW of plants fired by fossil and other combustible fuels, 302 GW of nuclear power,

470 GW of hydroelectric power (including pumped storage capacity), 194 GW of wind, 114 GW of solar (of which 110 GW came from solar PV and 11 GW of geothermal, tide/wave/ocean and other capacity combined). A total of 22.6 GW of capacity was added in 2013, with the biggest contributors being solar PV (25.2%), wind (7.2%) and hydro (0.8 %).

Total OECD generating capacity increased at an average annual rate of 3.5% from 1974 to 1990, with nuclear, hydroelectric and combustible fuel capacity increasing by average annual rates of 10.6%, 4.8%, and 2.2%, respectively. By comparison, from 1990 to 2013 total generating capacity increased at an average annual rate of 2.1%, with nuclear, hydroelectric and combustible fuels increasing by 0.5%, 1.0%, and 2.0%, respectively. In this period there were also substantial additions of solar PV and wind capacity, increasing at average annual rates of 47.7% and 21.1%, respectively, as many countries began to invest in renewable energy resources.

Figure 3: OECD net electrical capacity by source

Note: Other Sources includes geothermal, tide, wave, ocean, chemical heat and other non-specified (e.g. fuel cells) sources of electricity production.

The slower overall growth of total capacity additions since 1990 is partly attributable to economic evolution, which has resulted in the growth of less energy-intensive service industries. The OECD-wide pattern of electric power capacity and production conceals large differences among countries that reflect different resource endowments and economics of electricity generation, as well as different policy approaches. Data on the growth and type of installed capacity in individual OECD countries and regions are reported in detail in Table 15 in Part IV of the paper version of this report. The fuel used in individual OECD countries in the production of electricity is illustrated in the graphs in Part IV.

OECD prices

Average real electricity prices in the OECD increased by 1.9% in 2014 from 2013 levels. Prices for industry increased by 2.2% and prices for households by 1.6%.

Electricity prices for consumers vary widely among OECD countries. Based on available 2014 data, electricity prices for industry were the lowest in the United States (USD 70.14 per MWh) and the highest in Italy (USD 327.79 per MWh). Electricity prices for households varied from USD 90.08 per MWh in Mexico to USD 403.12 per MWh in Denmark.

Consumption

OECD consumption

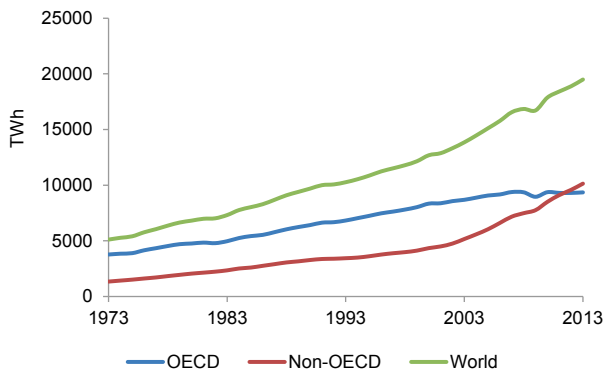
In 2013, calculated electricity consumption in OECD countries was 9 331 TWh, 0.6% higher than in 2012.

Based on provisional data, 2014 *apparent* consumption of electricity (gross production plus imports minus exports) in OECD countries was 10 771 TWh a 0.9% decrease compared with 2013.

Non-OECD consumption

In 2013, *calculated* final electricity consumption, which is equal to production plus imports minus exports, own use, other use, transmission losses and energy sector consumption, in non-OECD countries was 10 142 TWh. This represents an increase of 5.8% over the *calculated* final consumption in 2012.

Figure 4: Total final consumption of electricity



Trade

Transfers of electricity between utilities in neighbouring regions have been common for many years. Exchanges based on differences in national production costs between regions are economically efficient, and fluctuations in load can be balanced by exchanges with neighbouring utilities with different load profiles. Such exchanges reduce the necessary overall reserve margins by diversifying the potential sources of supply. Surplus capacity in a neighbouring region can result not only from simple differences in load timing, but also from differences in climate (e.g. seasonal peaks or renewable resources), economic structure, or the timing of forced and scheduled unit outages.

Often when reporting electricity flows, countries use electricity trade as a “balancing” item. This leads to

some distortion of the import and export data. In addition, the transmission and distribution line losses between net importers and net exporters are difficult to determine. Both of these factors lead to differences between reported net imports and net exports in trading countries.

OECD electricity trade

OECD imports of electricity grew from 88 TWh in 1973 to 474 TWh in 2014, an average annual growth rate of 4.2%. OECD exports of electricity grew from 81 TWh in 1973 to 476 TWh in 2014, an average annual growth rate of 4.4%.

Substantial trade in electricity occurred in OECD Europe, principally among OECD countries, and in OECD Americas. In OECD Europe, electricity imports grew at an average annual rate of 7.0% from 1973 to 1990, but slowed to a rate of 2.3% annually from 1990 to 2014. In OECD Americas, total imports increased by an average annual rate of 4.5% from 1973 to 1990, and by 3.4% from 1990 to 2014.

Non-OECD electricity trade

When considered as a single entity, non-OECD countries were net importers of electricity. In 2013, these countries reported electricity imports of 242 TWh and electricity exports of 219 TWh, resulting in net imports of 22 TWh.

Outside of the OECD there is substantial electricity trade among Russia, Kyrgyzstan, Turkmenistan, Ukraine and other countries of the former Soviet Union. These countries export significant quantities of electricity to net-importing countries such as Belarus, Moldova, and Latvia as well as to countries in Central and Western Europe.

In South America, electricity produced by large hydroelectric plants in Paraguay is exported to Brazil and Argentina (in 2013, net exports from Paraguay were 47.4 TWh).

In Africa, there is sizeable trade in the southern portion of the continent. South Africa exports a significant amount of power to Zimbabwe. Mozambique, which had been a net electricity importer, became a net exporter in 1998 as a new hydro project came into service. In 2013, net exports by South Africa were 4.5 TWh.

The People’s Republic of China exports electricity from southern nuclear and hydroelectric plants to Hong Kong, China. In 2013, net exports from the People’s Republic of China were 11.7 TWh.

India also imports a significant amount of electricity (5.6 TWh of net imports), a substantial part of which is produced by hydro facilities in Bhutan.

OECD EUROPE

3. Summary electricity production and consumption ⁽¹⁾

(TWh)

	1973	1980	1990	2000	2005	2012	2013	2014p
Gross production	1626.0	2059.9	2681.6	3253.9	3550.9	3636.1	3590.7	3506.0
Nuclear	74.4	230.4	786.8	939.4	986.5	880.6	877.0	875.8
Hydro	350.1	426.7	466.3	577.0	527.9	594.0	611.2	596.5
<i>of which:</i>								
<i>pumped storage production</i>	7.8	11.0	19.9	31.3	36.8	31.8	31.9	31.9
Geothermal	2.5	2.7	3.6	6.2	7.1	11.9	12.5	13.7
Solar	-	-	0.0	0.1	1.5	70.6	83.9	95.5
Tide, wave, ocean	0.6	0.5	0.5	0.5	0.5	0.5	0.4	0.5
Wind	-	0.0	0.8	22.3	71.0	208.4	237.2	252.8
Combustible fuels	1198.4	1399.6	1423.5	1707.0	1946.2	1865.7	1763.9	1666.3
<i>Coal</i>	663.1	887.2	1029.6	967.9	996.6	954.9	929.9	860.4
<i>Oil</i>	409.0	363.7	205.7	179.1	137.1	67.3	55.8	53.4
<i>Natural gas</i>	120.4	137.9	167.5	511.6	725.6	671.4	597.3	568.6
<i>Biofuels & waste</i>	2.8	6.4	20.7	48.4	86.8	172.2	180.9	146.2
Other (e.g. fuel cells)	-	-	0.1	1.4	10.3	4.4	4.5	4.8
- Own use by power plant	89.8	113.2	153.1	161.5	170.3	171.5	164.0	..
Net production	1536.2	1946.7	2528.5	3092.4	3380.5	3464.6	3426.8	..
Nuclear	..	211.2	742.0	889.6	936.2	834.9	831.8	..
Hydro	..	417.3	460.4	569.8	521.5	586.5	603.3	..
Geothermal	..	2.6	3.4	5.8	6.7	11.2	11.7	..
Solar	..	-	0.0	0.1	1.5	69.8	83.3	..
Tide, wave, ocean	..	0.5	0.5	0.5	0.5	0.5	0.4	..
Wind	..	0.0	0.8	22.3	70.8	206.0	235.6	..
Combustible fuels	..	1248.5	1321.2	1603.0	1834.0	1751.5	1656.4	..
Other (e.g. fuel cells)	..	-	0.1	1.3	9.3	4.1	4.3	..
- Used for heat pumps	-	-	0.0	2.3	2.0	1.9	1.6	1.1
- Used for electric boilers	-	-	0.5	2.7	1.2	1.4	1.4	1.4
- Used for pumped storage	13.6	17.8	29.6	43.0	50.8	43.6	44.0	43.9
+ Imports	68.3	106.5	217.7	282.3	357.4	372.2	366.5	397.0
- Exports	62.6	90.9	202.5	280.6	341.7	378.2	359.1	395.4
Electrical energy supplied	1528.4	1944.5	2513.6	3046.1	3342.4	3411.5	3387.2	..
- Transmission & distr. losses	115.8	145.1	178.5	238.4	242.3	245.1	246.5	..
- Statistical difference	-	-	1.5	-0.4	-0.1	-0.5	-0.8	..
Total consumption	1412.6	1799.4	2333.6	2808.2	3100.2	3167.0	3141.5	..
- Energy industry consumption ⁽²⁾	70.4	90.6	103.8	97.9	108.6	98.9	93.3	..
Final consumption	1342.2	1708.7	2229.8	2710.2	2991.6	3068.1	3048.2	..
Industry	737.3	856.9	1014.3	1145.8	1227.7	1135.4	1131.0	..
Transport	39.5	48.0	62.3	73.5	68.6	66.6	67.0	..
Commercial & publ. serv.	202.5	289.6	469.0	674.4	782.2	909.7	896.3	..
Residential	335.2	472.3	638.5	767.1	858.6	895.5	893.5	..
Agriculture & fishing	23.1	35.8	42.5	44.6	50.3	53.0	52.4	..
Sector non specified	4.5	6.1	3.2	4.7	4.1	7.9	7.9	..

Source: IEA/OECD Electricity Statistics.

(1) Electricity generation from main activity producer power plants and autoproducers.

(2) Energy industry consumption = electricity consumed by transformation industries for heating, traction and lighting purposes; excludes own use by power plant and electricity used for heat pumps, electric boilers and pumped storage.

Note: Please refer to definitions in the introductory information.

FRANCE

3. Summary electricity production and consumption ⁽¹⁾

(TWh)

	1973	1980	1990	2000	2005	2012	2013	2014p
Gross production	182.5	258.0	420.8	540.0	576.2	565.8	572.5	563.0
Nuclear	14.7	61.3	314.1	415.2	451.5	425.4	423.7	436.5
Hydro	47.7	70.2	57.4	71.1	56.3	63.6	75.6	66.7
<i>of which:</i>								
<i>pumped storage production</i>	0.0	0.7	3.6	4.8	4.9	4.9	5.2	5.8
Geothermal	-	-	-	-	-	-	-	-
Solar	-	-	-	0.0	0.0	4.0	4.7	5.9
Tide, wave, ocean	0.6	0.5	0.5	0.5	0.5	0.5	0.4	0.5
Wind	-	-	-	0.1	1.0	15.0	16.0	17.0
Combustible fuels	119.5	126.0	48.7	53.1	66.9	56.7	51.4	35.7
<i>Coal</i>	35.9	70.4	35.4	30.9	30.7	21.6	24.8	12.4
<i>Oil</i>	73.3	48.4	8.7	7.2	7.9	6.2	2.5	2.3
<i>Natural gas</i>	10.1	7.0	3.0	11.5	23.1	21.8	17.2	13.7
<i>Biofuels & waste</i>	-	-	1.6 e	3.6	5.2	7.0	6.9	3.4
Other (e.g. fuel cells)	-	-	-	-	-	0.6	0.7	0.7
- Own use by power plant	8.0	11.3	19.6	23.8	26.0	24.5	23.8	..
Net production	174.5	246.7	401.2	516.1	550.2	541.3	548.7	..
Nuclear	..	57.9	297.9	395.2	430.0	404.9	403.7	..
Hydro	..	69.3	56.7	70.3	55.6	62.8	74.7	..
Geothermal	..	-	-	-	-	-	-	..
Solar	..	-	-	0.0	0.0	4.0	4.7	..
Tide, wave, ocean	..	0.5	0.5	0.5	0.5	0.5	0.4	..
Wind	..	-	-	0.1	1.0	15.0	16.0	..
Combustible fuels	..	118.9	46.0	50.1	63.1	53.4	48.5	..
Other (e.g. fuel cells)	..	-	-	-	-	0.6	0.7	..
- Used for heat pumps	-	-	-	-	-	-	0.0	0.0
- Used for electric boilers	-	-	-	-	-	-	-	-
- Used for pumped storage	0.2	1.0	4.9	6.6	6.6	6.7	7.1	8.0
+ Imports	4.7	15.6	6.7	3.7	8.1	12.2	11.7	7.9
- Exports	7.5	12.4	52.1	73.2	68.4	56.7	60.1	75.1
Electrical energy supplied	171.4	249.0	350.8	440.1	483.2	490.0	493.1	..
- Transmission & distr. losses	11.4	17.3	27.7	30.4	32.2	37.7	37.6	..
- Statistical difference	-	-	-0.2	-0.7	-0.1	-1.9	-1.5	..
Total consumption	160.0	231.7	323.3	410.4	451.1	454.2	457.1	..
- Energy industry consumption ⁽²⁾	11.4	22.5	21.0	25.5	28.3	20.1	16.4	..
Final consumption	148.6	209.1	302.2	384.9	422.8	434.1	440.7	..
Industry	84.0	95.4	114.7	134.7	139.5	114.3	111.4	..
Transport	6.4	6.9	8.9	11.7	12.2	12.4	12.8	..
Commercial & publ. serv.	26.9	43.6	79.4	104.0	122.8	139.4	138.0	..
Residential	30.2	61.5	96.9	128.7	138.5	158.3	167.9	..
Agriculture & fishing	1.1	1.5	2.1	2.7	7.4	8.1	8.8	..
Sector non specified	0.1	0.2	0.3	3.1	2.3 e	1.6	1.8	..

Source: IEA/OECD Electricity Statistics.

(1) Electricity generation from main activity producer power plants and autoproducers.

(2) Energy industry consumption = electricity consumed by transformation industries for heating, traction and lighting purposes; excludes own use by power plant and electricity used for heat pumps, electric boilers and pumped storage.

Note: Please refer to definitions in the introductory information.

FRANCE

Table 3 - Average prices and taxes in euros

Steam coal for industry (per tonne)						Steam coal for electricity generation (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	..	..	..	..	..	51.16	-	-	-	51.16
2005	..	..	..	..	..	60.28	-	-	-	60.28
2006	..	..	..	..	..	58.09	-	-	-	58.09
2007	..	..	..	..	..	61.22	-	-	-	61.22
2008	..	..	..	..	..	93.11	-	-	-	93.11
2009	..	..	..	..	..	82.02	-	-	-	82.02
2010	..	..	..	..	..	81.75	-	-	-	81.75
2011	..	..	..	..	..	92.26	-	-	-	92.26
2012	..	..	..	..	..	..	..	..	..	..
2013	..	..	..	..	..	..	..	..	..	..
2014	..	..	..	..	..	..	..	..	..	..
3Q2014	..	..	..	..	..	..	..	..	..	..
4Q2014	..	..	..	..	..	..	..	..	..	..
1Q2015	..	..	..	..	..	..	..	..	..	..
2Q2015	..	..	..	..	..	..	..	..	..	..
3Q2015	..	..	..	..	..	..	..	..	..	..
Steam coal for households (per tonne)						Coking coal for industry (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	..	..	..	..	..	60.32	-	-	-	60.32
2005	..	..	..	..	..	88.96	-	-	-	88.96
2006	..	..	..	..	..	106.13	-	-	-	106.13
2007	..	..	..	..	..	90.82	-	-	-	90.82
2008	..	..	..	..	..	148.02	-	-	-	148.02
2009	..	..	..	..	..	148.08	-	-	-	148.08
2010	..	..	..	..	..	164.46	-	-	-	164.46
2011	..	..	..	..	..	208.22	-	-	-	208.22
2012	..	..	..	..	..	..	..	..	..	..
2013	..	..	..	..	..	..	..	..	..	..
2014	..	..	..	..	..	..	..	..	..	..
3Q2014	..	..	..	..	..	..	..	..	..	..
4Q2014	..	..	..	..	..	..	..	..	..	..
1Q2015	..	..	..	..	..	..	..	..	..	..
2Q2015	..	..	..	..	..	..	..	..	..	..
3Q2015	..	..	..	..	..	..	..	..	..	..
Electricity for industry (per megawatt hour)						Electricity for households (per megawatt hour)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	35.60	4.50	-	4.50	40.10	85.50	12.00	16.46	28.49	113.99
2005	35.60	4.50	-	4.50	40.10	85.50	12.00	16.46	28.49	113.99
2006	35.90	4.50	-	4.50	40.40	86.10	12.10	16.40	28.50	114.60
2007	60.20	7.10	-	7.10	67.30	85.90	11.90	16.40	28.30	114.20
2008	64.40	7.40	-	7.40	71.70	84.50	11.70	16.30	28.00	112.40
2009	69.00	7.90	-	7.90	76.80	86.00	11.90	16.80	28.70	114.60
2010	72.10	8.64	-	8.64	80.74	91.01	15.23	18.54	33.78	124.79
2011	75.22	12.13	-	12.13	87.35	94.99	19.70	19.77	39.47	134.46
2012	76.60	13.82	-	13.82	90.42	95.08	21.13	20.05	41.17	136.26
2013	77.72	17.21	-	17.21	94.93	99.01	25.14	21.51	46.65	145.66
2014	75.30	19.64	-	19.64	94.93	104.39	28.51	23.20	51.72	156.11
3Q2014	75.08	19.63	-	19.63	94.71	103.98	28.51	23.13	51.64	155.61
4Q2014	75.96	19.65	-	19.65	95.62	105.62	28.54	23.42	51.96	157.58
1Q2015	76.41	22.24	-	22.24	98.65	106.45	31.69	24.18	55.87	162.32
2Q2015	76.41	22.24	-	22.24	98.65	106.45	31.69	24.18	55.87	162.32
3Q2015	..	..	..	..	..	..	..	..	..	..

GERMANY

3. Summary electricity production and consumption ⁽¹⁾

(TWh)

	1973	1980	1990	2000	2005	2012	2013	2014p
Gross production	375.9	467.6	550.0	576.5	622.6	629.8	633.2	614.6
Nuclear	12.1	55.6	152.5	169.6	163.1	99.5	97.3	97.1
Hydro	16.8	20.3	19.8	26.0	26.4	27.8	28.8	25.4
<i>of which:</i>								
<i>pumped storage production</i>	1.6	1.2	2.4	4.2	6.8	6.1	5.8	5.9
Geothermal	-	-	-	-	-	0.0	0.1	0.1
Solar	-	-	0.0	0.1	1.3	26.4	31.0	34.9
Tide, wave, ocean	-	-	-	-	-	-	-	-
Wind	-	-	0.1	9.4	27.2	50.7	51.7	56.0
Combustible fuels	347.0	391.7	377.7	371.6 e	401.4	423.4	422.5	399.2
<i>Coal</i>	258.3	293.5	321.6	304.2 e	297.7	287.0	293.4	275.3
<i>Oil</i>	44.8	26.7	10.4	4.8	12.0	7.6	7.2	6.0
<i>Natural gas</i>	41.0	66.0	40.5	52.5	74.0	77.6	68.7	61.3
<i>Biofuels & waste</i>	-	2.6	5.2	10.1 e	17.6	51.2	53.1	44.4
Other (e.g. fuel cells)	-	-	-	-	3.2	2.0	1.8	1.8
- Own use by power plant	26.1	31.0	41.4	38.1	39.8	37.1	36.5	..
Net production	349.8	436.6	508.6	538.5	582.7	592.7	596.7	..
Nuclear	..	52.5	144.4	160.7	154.6	94.2	92.1	..
Hydro	..	20.0	19.4	25.6	26.0	27.3	28.3	..
Geothermal	..	-	-	-	-	0.0	0.1	..
Solar	..	-	0.0	0.1	1.3	26.4	31.0	..
Tide, wave, ocean	..	-	-	-	-	-	-	..
Wind	..	-	0.1	9.4	27.1	50.5	51.6	..
Combustible fuels	..	364.1	344.7	342.8 e	370.9	392.5	392.0	..
Other (e.g. fuel cells)	..	-	-	-	2.9	1.9	1.6	..
- Used for heat pumps	-	-	-	-	-	-	-	-
- Used for electric boilers	-	-	-	-	-	-	-	-
- Used for pumped storage	3.8	3.7	5.0	6.0	9.5	8.1	7.8	8.0
+ Imports	19.7	23.4	31.7	45.1	56.9	46.3	39.2	40.4
- Exports	8.1	16.2	30.7	42.1	61.4	66.8	71.4	74.3
Electrical energy supplied	357.6	440.0	504.5	535.5	568.7	564.1	556.7	..
- Transmission & distr. losses	20.0	20.8	23.5	34.1	29.3	24.6	24.5	..
- Statistical difference	-	-	-	-	-	-0.0	-	..
Total consumption	337.6	419.2	481.0	501.4	539.3	539.5	532.2	..
- Energy industry consumption ⁽²⁾	24.7	27.3	25.9	18.0	17.1	13.7	14.1	..
Final consumption	312.9	391.9	455.1	483.5	522.3	525.8	518.1	..
Industry	178.3	199.5	216.5	211.6	230.6	226.2	224.3	..
Transport	9.9	12.0	13.7	15.9	13.2	12.1	12.0	..
Commercial & publ. serv.	40.1	58.2	87.9	125.5	137.2	150.5	145.8	..
Residential	78.6	115.0	137.1	130.5	141.3	137.0	136.0	..
Agriculture & fishing	6.1	7.1	-	-	-	-	-	..
Sector non specified	-	-	-	-	-	-	-	..

Source: IEA/OECD Electricity Statistics.

(1) Electricity generation from main activity producer power plants and autoproducers.

(2) Energy industry consumption = electricity consumed by transformation industries for heating, traction and lighting purposes; excludes own use by power plant and electricity used for heat pumps, electric boilers and pumped storage.

Note: Please refer to definitions in the introductory information.

GERMANY

Table 3 - Average prices and taxes in euros

Steam coal for industry (per tonne)						Steam coal for electricity generation (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	..	..	..	..	..	56.35	-	-	-	56.35
2005	..	..	..	..	..	64.19	-	-	-	64.19
2006	..	..	..	..	..	62.13	-	-	-	62.13
2007	..	..	..	..	..	65.89	-	-	-	65.89
2008	..	..	..	..	..	104.36	-	-	-	104.36
2009	..	..	..	..	..	79.25	-	-	-	79.25
2010	..	..	..	..	..	88.94	-	-	-	88.94
2011	..	..	..	..	..	110.14	-	-	-	110.14
2012	..	..	..	..	..	98.38	-	-	-	98.38
2013	..	..	..	..	..	82.01	-	-	-	82.01
2014	..	..	..	..	..	75.82	-	-	-	75.82
3Q2014	..	..	..	..	..	74.64	-	-	-	74.64
4Q2014	..	..	..	..	..	75.66	-	-	-	75.66
1Q2015	..	..	..	..	..	77.40	-	-	-	77.40
2Q2015	..	..	..	..	..	..	..	..	..	..
3Q2015	..	..	..	..	..	..	..	..	..	..
Steam coal for households (per tonne)						Coking coal for industry (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	..	..	..	..	..	c	-	-	-	c
2005	..	..	..	..	..	c	-	-	-	c
2006	..	..	..	..	..	c	-	-	-	c
2007	..	..	..	..	..	c	-	-	-	c
2008	..	..	..	..	..	c	-	-	-	c
2009	x	x	x	x	x	c	-	-	-	c
2010	x	x	x	x	x	c	-	-	-	c
2011	x	x	x	x	x	c	-	-	-	c
2012	x	x	x	x	x	c	-	-	-	c
2013	x	x	x	x	x	c	-	-	-	c
2014	x	x	x	x	x	c	-	-	-	c
3Q2014	x	x	x	x	x	c	-	-	-	c
4Q2014	x	x	x	x	x	c	-	-	-	c
1Q2015	x	x	x	x	x	c	-	-	-	c
2Q2015	x	x	x	x	x	c	-	-	-	c
3Q2015	x	x	x	x	x	c	-	-	-	c
Electricity for industry (per megawatt hour)						Electricity for households (per megawatt hour)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	61.9	..	-	..	61.9	137.2	..	22.0	22.0	159.0
2005	67.6	..	-	..	67.6	147.4	..	23.6	23.6	171.0
2006	75.1	..	-	..	75.1	152.3	..	24.4	24.4	176.7
2007	79.5	..	-	..	79.5	161.4	..	30.7	30.7	192.1
2008	..	..	-	..	88.2	135.4	50.1	35.3	85.4	220.8
2009	83.8	16.7	-	16.7	100.5	138.0	54.3	36.5	90.8	228.8
2010	79.5	23.1	-	23.1	102.6	137.6	64.7	38.4	103.1	240.7
2011	79.8	33.3	-	33.3	113.0	140.1	72.5	40.4	112.9	253.0
2012	77.8	37.9	-	37.9	115.7	143.7	77.9	42.1	119.9	263.6
2013	77.5	50.1	-	50.1	127.6	149.1	96.3	46.6	142.9	292.0
2014	71.7	63.4	-	63.4	135.1	143.8	106.5	47.6	154.0	297.8
3Q2014	71.4	61.2	-	61.2	132.6	144.0	105.9	47.5	153.4	297.4
4Q2014	71.4	61.2	-	61.2	132.6	144.0	105.9	47.5	153.4	297.4
1Q2015	..	..	..	..	..	..	..	..	..	..
2Q2015	..	..	..	..	..	..	..	..	..	..
3Q2015	..	..	..	..	..	..	..	..	..	..

JAPAN

3. Summary electricity production and consumption ⁽¹⁾

(TWh)

	1973	1980	1990	2000	2005	2012	2013	2014p
Gross production	470.3	576.3	842.0	1058.5	1099.8	1034.3	1045.3	1025.1
Nuclear	9.7	82.6	202.3	322.0	304.8	15.9	9.3	-
Hydro	71.7	92.1	95.8	96.8	86.4	83.6	84.9	87.1
<i>of which:</i>								
<i>pumped storage production</i>	4.9	3.8	6.5	9.6	9.9	8.2	6.8	5.2
Geothermal	0.3	0.9	1.7	3.3	3.2	2.6	2.6	2.6
Solar	-	-	0.0 e	0.3 e	1.5 e	7.0 e	14.3 e	24.4
Tide, wave, ocean	-	-	-	-	-	-	-	-
Wind	-	-	-	0.1	1.8	4.8	5.2	5.0
Combustible fuels	388.6	400.7	542.2	635.9	702.2	920.3	929.0	906.1
<i>Coal</i>	37.3	54.9	116.3	229.0	300.8	303.8	336.7	337.4
<i>Oil</i>	340.8	264.7	236.6	135.4	135.2	180.8	149.9	114.1
<i>Natural gas</i>	10.5	81.1	178.5	256.0	243.8	397.2	401.7	412.7
<i>Biofuels & waste</i>	-	-	10.7	15.5	22.4	38.5	40.7	41.8
Other (e.g. fuel cells)	-	-	-	-	-	-	-	-
- Own use by power plant	15.7	24.6	32.1	39.3	42.9	40.7	37.9	..
Net production	454.6	551.8	809.9	1019.3	1056.9	993.6	1007.4	..
Nuclear	..	78.6	193.9	308.7	290.5	12.4	6.3	..
Hydro	..	91.5	95.1	96.1	85.8	83.2	84.5	..
Geothermal	..	-	1.6	3.1	3.0	2.4	2.3	..
Solar	..	-	0.0 e	0.3 e	1.5 e	7.0 e	14.3 e	..
Tide, wave, ocean	..	-	-	-	-	-	-	..
Wind	..	-	-	0.1	1.8	4.8	5.2	..
Combustible fuels	..	381.6	519.3	611.0	674.4	883.8	894.8	..
Other (e.g. fuel cells)	..	-	-	-	-	-	-	..
- Used for heat pumps	-	-	-	-	-	-	-	-
- Used for electric boilers	-	- e	0.3	1.1	1.1	1.1	1.1	1.0
- Used for pumped storage	4.7	6.1	10.0	14.8	13.5	10.2	7.9	4.9
+ Imports	-	-	-	-	-	-	-	-
- Exports	-	-	-	-	-	-	-	-
Electrical energy supplied	449.8	545.6	799.6	1003.4	1042.3	982.4	998.5	..
- Transmission & distr. losses	28.1	25.4	40.8	46.9	50.4	45.4	47.5	..
- Statistical difference	-	-	0.0	-0.0	0.0	-17.8	-14.1	..
Total consumption	421.7	520.2	758.8	956.5	991.8	954.8	965.0	..
- Energy industry consumption ⁽²⁾	6.5	7.0	9.2	12.7	13.8	14.3	14.8	..
Final consumption	415.1	513.3	749.6	943.7	978.1	940.5	950.2	..
Industry	291.4	327.8	337.3	361.6	341.1	268.4	271.2	..
Transport	13.2	15.2	16.8	18.6	19.1	18.2	18.3	..
Commercial & publ. serv.	30.1	53.0	209.7	303.7	332.3	358.9	361.5	..
Residential	79.2	116.1	184.1	257.9	283.1	287.3	285.2	..
Agriculture & fishing	1.2	1.2	1.6	1.6	1.0	0.9	0.9	..
Sector non specified	-	-	-	0.3	1.5	6.8	13.1	..

Source: IEA/OECD Electricity Statistics.

(1) Electricity generation from main activity producer power plants and autoproducers.

(2) Energy industry consumption = electricity consumed by transformation industries for heating, traction and lighting purposes; excludes own use by power plant and electricity used for heat pumps, electric boilers and pumped storage.

Note: Please refer to definitions in the introductory information.

JAPAN

Table 3 - Average prices and taxes in yen

Steam coal for industry (per tonne)						Steam coal for electricity generation (per tonne)				
	Ex-tax price	Excise tax	Consump. tax	Total tax	Total price	Ex-tax price	Excise tax	Consump. tax	Total tax	Total price
2004	5 506	-	275	275	5 781	..	..	..	..	..
2005	6 781	-	339	339	7 120	..	..	..	..	..
2006	7 222	460	384	844	8 066	..	..	..	..	..
2007	8 105	640	437	1 077	9 183	..	..	..	..	..
2008	12 435	700	657	1 357	13 792	..	..	..	..	..
2009	10 144	700	542	1 242	11 386	..	..	..	..	..
2010	9 405	700	505	1 205	10 610	..	..	..	..	..
2011	10 986	700	584	1 284	12 270	..	..	..	..	..
2012	10 688	755	572	1 327	12 015	..	..	..	..	..
2013	10 811	920	587	1 507	12 318	..	..	..	..	..
2014	10 259	1 085	819	1 904	12 163	..	..	..	..	..
3Q2014	9 781	1 140	874	2 014	11 795	..	..	..	..	..
4Q2014	10 260	1 140	912	2 052	12 312	..	..	..	..	..
1Q2015	10 156	1 140	904	2 044	12 199	..	..	..	..	..
2Q2015	9 795	1 140	872	2 012	11 807	..	..	..	..	..
3Q2015	..	..	..	..	..	..	..	..	..	..
Steam coal for households (per tonne)						Coking coal for industry (per tonne)				
	Ex-tax price	Excise tax	Consump. tax	Total tax	Total price	Ex-tax price	Excise tax	Consump. tax	Total tax	Total price
2004	x	x	x	x	x	6 691	-	335	335	7 026
2005	x	x	x	x	x	10 220	-	511	511	10 731
2006	x	x	x	x	x	11 179	460	582	1 042	12 220
2007	x	x	x	x	x	10 717	640	568	1 208	11 925
2008	x	x	x	x	x	19 659	700	1 018	1 718	21 377
2009	x	x	x	x	x	16 274	700	849	1 549	17 823
2010	x	x	x	x	x	13 932	700	732	1 432	15 364
2011	x	x	x	x	x	18 238	700	947	1 647	19 885
2012	x	x	x	x	x	15 223	755	799	1 554	16 777
2013	x	x	x	x	x	13 600	920	726	1 646	15 246
2014	x	x	x	x	x	12 017	1 085	944	2 029	14 046
3Q2014	x	x	x	x	x	11 153	1 140	983	2 123	13 276
4Q2014	x	x	x	x	x	11 845	1 140	1 039	2 179	14 023
1Q2015	x	x	x	x	x	12 214	1 140	1 068	2 208	14 422
2Q2015	x	x	x	x	x	11 886	1 140	1 042	2 182	14 068
3Q2015	x	x	x	x	x	..	..	..	..	..
Electricity for industry (per megawatt hour)						Electricity for households (per megawatt hour)				
	Ex-tax price	Excise tax	Consump. tax	Total tax	Total price	Ex-tax price	Excise tax	Consump. tax	Total tax	Total price
2004	13 329	425	688	1 113	14 442	20 796	425	1 061	1 486	22 282
2005	13 112	400	676	1 076	14 188	20 391	400	1 040	1 440	21 831
2006	13 218	400	681	1 081	14 299	20 326	400	1 036	1 436	21 762
2007	13 280	375	683	1 058	14 338	20 409	375	1 039	1 414	21 823
2008	14 026	375	720	1 095	15 121	20 925	375	1 065	1 440	22 365
2009	14 388	375	738	1 113	15 501	20 925	375	1 065	1 440	22 365
2010	13 175	375	678	1 053	14 227	19 999	375	1 019	1 394	21 393
2011	13 919	375	715	1 090	15 009	20 458	375	1 042	1 417	21 874
2012	15 130	375	775	1 150	16 280	21 713	375	1 104	1 479	23 192
2013	16 629	375	850	1 225	17 855	23 258	375	1 182	1 557	24 815
2014	18 188	375	1 350	1 725	19 913	24 665	375	1 768	2 143	26 808
3Q2014	18 692	375	1 525	1 900	20 592	25 947	375	2 106	2 481	28 428
4Q2014	18 188	375	1 485	1 860	20 048	24 664	375	2 003	2 378	27 042
1Q2015	18 372	375	1 500	1 875	20 247	24 862	375	2 019	2 394	27 256
2Q2015	18 576	375	1 516	1 891	20 467	25 078	375	2 036	2 411	27 489
3Q2015	..	..	..	..	..	..	..	..	..	..

KOREA

3. Summary electricity production and consumption ⁽¹⁾

(TWh)

	1973	1980	1990	2000	2005	2012	2013	2014p
Gross production	14.8	37.2	105.4 e	290.1	389.4	534.6	542.0	545.1
Nuclear	-	3.5	52.9	109.0	146.8	150.3	138.8	156.4
Hydro	1.3	2.0	6.4	5.6	5.2	7.7	8.4	7.8
<i>of which:</i>								
<i>pumped storage production</i>	-	-	-	1.6	1.5	3.7	4.1	3.9
Geothermal	-	-	-	-	-	-	-	-
Solar	-	-	0.0 e	0.0 e	0.0	1.1	1.6	1.6
Tide, wave, ocean	-	-	-	-	-	-	0.5	0.5
Wind	-	-	-	0.0 e	0.1	0.9	1.1	1.2
Combustible fuels	13.5 e	31.8 e	46.1	175.5 e	237.2	374.1	390.9	376.9
<i>Coal</i>	1.3 e	2.5 e	17.7	111.4	148.8	239.3	222.8	228.1
<i>Oil</i>	12.2	29.3	18.9 e	34.6	26.0 e	21.2 e	21.4	16.5
<i>Natural gas</i>	-	-	9.6	29.5	62.2	111.9	144.8	130.8
<i>Biofuels & waste</i>	-	-	-	0.1 e	0.3 e	1.7	1.8	1.3
Other (e.g. fuel cells)	-	-	..	..	0.0	0.5	0.7	0.7
- Own use by power plant	0.7 e	2.0 e	5.1	12.4	16.6	20.3	20.5	..
Net production	14.1 e	35.2 e	100.3 e	277.7	372.8	514.3	521.5	..
Nuclear	..	3.3 e	50.4	103.5	139.3	143.5	132.5	..
Hydro	..	2.0 e	6.3	5.6	5.1	7.5	8.3	..
Geothermal	..	-	-	-	-	-	-	..
Solar	..	-	0.0 e	0.0 e	0.0	1.1	1.6	..
Tide, wave, ocean	..	-	-	-	-	-	0.5	..
Wind	..	-	-	0.0 e	0.1	0.9	1.1	..
Combustible fuels	..	30.0 e	43.6	168.6 e	228.2	360.8	376.7	..
Other (e.g. fuel cells)	..	-	..	..	0.0	0.5 e	0.7	..
- Used for heat pumps	-	-	-	-	-	-	-	-
- Used for electric boilers	-	-	-	-	-	-	-	-
- Used for pumped storage	-	0.1	2.3	2.1	2.0	4.8	5.4	5.1
+ Imports	-	-	-	-	-	-	-	-
- Exports	-	-	-	-	-	-	-	-
Electrical energy supplied	14.1 e	35.1 e	98.0 e	275.6	370.8	509.6	516.1	..
- Transmission & distr. losses	1.3 e	2.4 e	3.6	12.5	13.7	17.3	18.3	..
- Statistical difference	-	-	0.0 e	-	-0.5	-0.3	-0.4	..
Total consumption	12.8	32.7	94.4	263.1	357.6	492.6	498.2	..
- Energy industry consumption ⁽²⁾	-	-	-	-	-	11.2	11.0	..
Final consumption	12.8	32.7	94.4	263.1	357.6	481.4	487.1	..
Industry	8.8	22.7	57.8	150.4	184.0	250.6	255.7	..
Transport	0.1	0.4	1.0	2.0	2.6	2.3	2.2	..
Commercial & publ. serv.	2.2	4.1	16.4	68.3	113.2	152.5	152.2	..
Residential	1.5	5.3	17.7	37.1	50.9	63.9	64.0	..
Agriculture & fishing	0.1	0.2	1.5	5.3	7.0	12.1	13.1	..
Sector non specified	-	-	-	-	-	-	-	..

Source: IEA/OECD Electricity Statistics.

(1) Electricity generation from main activity producer power plants and autoproducers.

(2) Energy industry consumption = electricity consumed by transformation industries for heating, traction and lighting purposes; excludes own use by power plant and electricity used for heat pumps, electric boilers and pumped storage.

Note: Please refer to definitions in the introductory information.

KOREA

Table 3 - Average prices and taxes in wons

Steam coal for industry (per tonne)						Steam coal for electricity generation (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	62 495	..	..	..	..	54 543
2005	64 479	..	..	..	..	56 432
2006	54 853	..	..	..	..	49 119
2007	65 984	..	..	..	..	56 055
2008	129 536	..	..	..	..	100 149
2009	113 138	..	..	..	..	105 229
2010
2011
2012
2013
2014
3Q2014
4Q2014
1Q2015
2Q2015
3Q2015
Steam coal for households (per tonne)						Coking coal for industry (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	78 452
2005	112 530
2006	107 902
2007	96 501
2008	256 398
2009	203 671
2010
2011
2012
2013
2014
3Q2014
4Q2014
1Q2015
2Q2015
3Q2015
Electricity for industry (per megawatt hour)						Electricity for households (per megawatt hour)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	60 230	..	..	..	..	90 940
2005	60 250	..	..	..	..	91 070
2006	61 920	..	..	..	..	93 700
2007	64 560	..	..	..	..	94 780
2008	66 240	..	..	..	..	97 580
2009	73 690	..	..	..	..	98 070
2010	96 100
2011	98 200
2012	104 800
2013	111 050
2014	115 425
3Q2014	128 300
4Q2014	112 000
1Q2015	114 100
2Q2015	107 000
3Q2015

SPAIN

3. Summary electricity production and consumption ⁽¹⁾

(TWh)

	1973	1980	1990	2000	2005	2012	2013	2014p
Gross production	76.3	110.5	151.9	224.5	294.1	297.6	283.6	277.8
Nuclear	6.5	5.2	54.3	62.2	57.5	61.5	56.7	57.3
Hydro	29.5	30.8	26.2	31.8 e	23.0 e	24.2	41.1	42.9
<i>of which:</i>								
<i>pumped storage production</i>	0.6	1.3	0.7	3.6	4.6	3.6	4.3	3.8
Geothermal	-	-	-	-	-	-	-	-
Solar	-	-	0.0	0.0	0.0 e	12.0	12.7	13.7
Tide, wave, ocean	-	-	-	-	-	-	-	-
Wind	-	-	0.0	4.7	21.2 e	49.5	53.9	52.3
Combustible fuels	40.2	74.5	71.4	125.7 e	187.3 e	150.3	119.2	111.6
<i>Coal</i>	14.3	32.8	60.7	80.9	80.8	56.0	42.4	44.7
<i>Oil</i>	25.1	38.4	8.6	22.6	24.4	15.3	13.8	14.2
<i>Natural gas</i>	0.8	2.9	1.5	20.2	79.0	73.3	57.1	47.2
<i>Biofuels & waste</i>	0.1	0.4	0.7	2.1	3.1 e	5.7	5.9	4.3
Other (e.g. fuel cells)	-	-	-	-	5.0	0.2	..	-
- Own use by power plant	3.3	5.3	7.3	10.0	11.9	11.0	9.1	..
Net production	72.9	105.2	144.6	214.4	282.1	286.6	274.5	..
Nuclear	..	4.9	51.9	59.8	55.4	58.8	54.3	..
Hydro	..	30.4	25.8	31.5 e	22.7	23.7	40.6	..
Geothermal	..	-	-	-	-	-	-	..
Solar	..	-	0.0	0.0	0.0 e	11.6	12.5	..
Tide, wave, ocean	..	-	-	-	-	-	-	..
Wind	..	-	0.0	4.7	21.1	48.3	52.9	..
Combustible fuels	..	69.9	66.9	118.4 e	178.4	144.0	114.1	..
Other (e.g. fuel cells)	..	-	-	-	4.5	0.2	..	..
- Used for heat pumps	-	-	-	-	-	-	-	-
- Used for electric boilers	-	-	-	-	-	-	-	-
- Used for pumped storage	1.5	1.9	1.0	4.9	6.4	5.0	6.0	5.3
+ Imports	0.3	2.3	3.2	12.3	10.2	7.8	9.9	12.3
- Exports	2.3	3.7	3.6	7.8	11.6	19.0	16.6	15.7
Electrical energy supplied	69.4	102.0	143.2	214.0	274.4	270.4	261.8	..
- Transmission & distr. losses	8.7	10.0	14.0	19.3	26.0	25.7	25.0	..
- Statistical difference	-	-	-	-	-	-0.8	-0.3	..
Total consumption	60.7	92.0	129.2	194.7	248.5 e	245.5	237.1	..
- Energy industry consumption ⁽²⁾	1.7	2.2	3.4	6.3	6.2 e	5.3	5.1	..
Final consumption	59.0	89.8	125.8	188.5	242.2 e	240.2	232.0	..
Industry	37.9	53.9	63.3	85.6	105.0 e	72.5	70.0	..
Transport	1.5	1.9	3.7	4.2	5.4 e	4.5	4.3	..
Commercial & publ. serv.	7.5	12.2	25.1	50.0	63.8 e	80.2	77.5	..
Residential	10.9	19.6	30.2	43.6	62.6 e	75.1	72.5	..
Agriculture & fishing	1.3	2.1	3.5	5.0	5.3 e	4.0	3.9	..
Sector non specified	-	-	-	-	0.1 e	4.0	3.9	..

Source: IEA/OECD Electricity Statistics.

(1) Electricity generation from main activity producer power plants and autoproducers.

(2) Energy industry consumption = electricity consumed by transformation industries for heating, traction and lighting purposes; excludes own use by power plant and electricity used for heat pumps, electric boilers and pumped storage.

Note: Please refer to definitions in the introductory information.

SPAIN

Table 3 - Average prices and taxes in euros

Steam coal for industry (per tonne)						Steam coal for electricity generation (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004
2005
2006
2007
2008
2009
2010
2011
2012
2013
2014
3Q2014
4Q2014
1Q2015
2Q2015
3Q2015
Steam coal for households (per tonne)						Coking coal for industry (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	C	C	C	C	C
2005	C	C	C	C	C
2006	C	C	C	C	C
2007	C	C	C	C	C
2008	C	C	C	C	C
2009	C	C	C	C	C
2010	C	C	C	C	C
2011	C	C	C	C	C
2012	C	C	C	C	C
2013	C	C	C	C	C
2014	C	C	C	C	C
3Q2014	C	C	C	C	C
4Q2014	C	C	C	C	C
1Q2015	C	C	C	C	C
2Q2015	C	C	C	C	C
3Q2015	C	C	C	C	C
Electricity for industry (per megawatt hour)						Electricity for households (per megawatt hour)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	45.9	2.3	-	2.3	48.2	100.1	5.1	16.8	21.9	122.0
2005	63.8	3.3	-	3.3	67.1	101.4	5.2	17.0	22.2	123.6
2006	69.2	3.5	-	3.5	72.8	107.7	5.5	18.1	23.6	131.3
2007	62.2	3.2	-	3.2	65.4	111.9	5.7	18.8	24.5	136.5
2008	81.4	4.2	-	4.2	85.6	122.3	6.3	20.6	26.8	149.1
2009	70.6	3.6	-	3.6	74.3	125.4	6.4	21.1	27.5	152.8
2010	94.7	4.8	-	4.8	99.6	150.2	7.7	28.4	36.1	186.3
2011	101.7	5.2	-	5.2	106.9	171.1	8.8	32.4	41.1	212.2
2012
2013
2014
3Q2014
4Q2014
1Q2015
2Q2015
3Q2015

SWEDEN

3. Summary electricity production and consumption ⁽¹⁾

(TWh)

	1973	1980	1990	2000	2005	2012	2013	2014p
Gross production	78.1	96.7	146.5	145.3	158.4	166.6	153.2	154.1
Nuclear	2.1	26.5	68.2	57.3	72.4	64.0	66.5	64.4
Hydro	59.9	59.2	73.0	78.6	72.9	79.1	61.5	64.4
<i>of which:</i>								
<i>pumped storage production</i>	0.0	0.4	0.5	0.0	0.1	0.1	0.1	0.0
Geothermal	-	-	-	-	-	-	-	-
Solar	-	-	-	0.0	0.0	0.0	0.0	0.1
Tide, wave, ocean	-	-	-	-	-	-	-	-
Wind	-	-	0.0	0.5	0.9	7.2	9.8	11.5
Combustible fuels	16.1	11.0	5.3	8.9	12.2	16.3	15.3	13.8
<i>Coal</i>	0.5	0.2	1.6	2.5	1.9	1.3	1.3	2.6
<i>Oil</i>	15.2	10.0	1.3	1.5	1.4	0.6	0.4	0.6
<i>Natural gas</i>	-	-	0.4	0.5	0.6	0.9	0.8	1.3
<i>Biofuels & waste</i>	0.4	0.7	2.0	4.3	8.4	13.5	12.7	8.2
Other (e.g. fuel cells)	-	-	-	-	-	-	-	-
- Own use by power plant	1.7	2.3	4.0	3.7	3.8	3.7	3.6	..
Net production	76.4	94.4	142.5	141.6	154.6	162.8	149.5	..
Nuclear	..	25.3	65.2	54.8	69.5	61.4	63.6	..
Hydro	..	58.5	72.3	77.9	72.3	78.5	60.9	..
Geothermal	..	-	-	-	-	-	-	..
Solar	..	-	-	0.0	0.0	0.0	0.0	..
Tide, wave, ocean	..	-	-	-	-	-	-	..
Wind	..	-	0.0	0.5	0.9	7.2	9.8	..
Combustible fuels	..	10.5	5.0	8.5	11.9	15.8	15.1	..
Other (e.g. fuel cells)	..	-	-	-	-	-	-	..
- Used for heat pumps	-	-	-	2.2	1.9	1.6	1.2	0.6
- Used for electric boilers	-	-	..	2.1	0.3	0.2	0.3	0.2
- Used for pumped storage	0.0	0.5	0.8	0.0	0.1	0.2	0.2	0.0
+ Imports	6.0	3.4	12.9	18.3	14.6	11.7	12.7	13.9
- Exports	5.2	2.8	14.7	13.6	22.0	31.3	22.7	29.5
Electrical energy supplied	77.1	94.4	140.0	142.0	144.9	141.3	137.9	..
- Transmission & distr. losses	7.7	8.3	9.2	10.8	11.7	11.0	10.0	..
- Statistical difference	-	-	0.0	-	-	-	-	..
Total consumption	69.4	86.1	130.7	131.1	133.2	130.3	127.9	..
- Energy industry consumption ⁽²⁾	0.2	1.2	10.4	2.4	2.5	3.0	2.9	..
Final consumption	69.2	84.9	120.3	128.7	130.7	127.3	125.0	..
Industry	39.5	40.6	54.0	56.9	57.6	54.1	52.0	..
Transport	2.1	2.3	2.5	3.2	2.8	2.7	2.8	..
Commercial & publ. serv.	11.1	15.2	24.4	25.4	26.1	30.8	30.8	..
Residential	15.7	25.7	38.1	42.0	42.7	38.9	38.2	..
Agriculture & fishing	0.7	1.1	1.5	1.2	1.5	0.9	1.2	..
Sector non specified	-	-	-	-	-	-	-	..

Source: IEA/OECD Electricity Statistics.

(1) Electricity generation from main activity producer power plants and autoproducers.

(2) Energy industry consumption = electricity consumed by transformation industries for heating, traction and lighting purposes; excludes own use by power plant and electricity used for heat pumps, electric boilers and pumped storage.

Note: Please refer to definitions in the introductory information.

SWEDEN

Table 3 - Average prices and taxes in Swedish kronor

Steam coal for industry (per tonne)						Steam coal for electricity generation (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	..	..	..	..	..	..	..	..	..	..
2005	..	..	..	..	..	..	..	..	..	..
2006	..	..	..	..	..	..	..	..	..	..
2007	..	..	..	..	..	..	..	..	..	..
2008	..	..	..	..	..	..	..	..	..	..
2009	..	..	..	..	..	..	..	..	..	..
2010	..	..	..	..	..	..	..	..	..	..
2011	..	..	..	..	..	..	..	..	..	..
2012	..	..	..	..	..	..	..	..	..	..
2013	..	..	..	..	..	..	..	..	..	..
2014	..	..	..	..	..	..	..	..	..	..
3Q2014	..	..	..	..	..	..	..	..	..	..
4Q2014	..	..	..	..	..	..	..	..	..	..
1Q2015	..	..	..	..	..	..	..	..	..	..
2Q2015	..	..	..	..	..	..	..	..	..	..
3Q2015	..	..	..	..	..	..	..	..	..	..
Steam coal for households (per tonne)						Coking coal for industry (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	x	x	x	x	x	..	..	..	..	..
2005	x	x	x	x	x	..	..	..	..	..
2006	x	x	x	x	x	..	..	..	..	..
2007	x	x	x	x	x	..	..	..	..	..
2008	x	x	x	x	x	..	..	..	..	..
2009	x	x	x	x	x	..	..	..	..	..
2010	x	x	x	x	x	..	..	..	..	..
2011	x	x	x	x	x	..	..	..	..	..
2012	x	x	x	x	x	..	..	..	..	..
2013	x	x	x	x	x	..	..	..	..	..
2014	x	x	x	x	x	..	..	..	..	..
3Q2014	x	x	x	x	x	..	..	..	..	..
4Q2014	x	x	x	x	x	..	..	..	..	..
1Q2015	x	x	x	x	x	..	..	..	..	..
2Q2015	x	x	x	x	x	..	..	..	..	..
3Q2015	x	x	x	x	x	..	..	..	..	..
Electricity for industry (per megawatt hour)						Electricity for households (per megawatt hour)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	..	..	..	..	..	..	..	..	..	..
2005	..	..	..	..	..	..	..	..	..	..
2006	..	..	..	..	..	..	..	..	..	..
2007	507	5	-	5	512	801	256	266	522	1 323
2008	624	5	-	5	629	898	254	289	543	1 441
2009	628	5	-	5	633	920	265	300	565	1 485
2010	689	5	-	5	694	990	270	310	580	1 570
2011	670	5	-	5	675	1 018	270	321	591	1 609
2012	599	5	-	5	604	938	274	303	578	1 516
2013	584	5	-	5	589	942	276	304	580	1 522
2014	556	5	-	5	561	900	277	294	572	1 471
3Q2014	547	5	-	5	552	911	277	297	574	1 485
4Q2014	547	5	-	5	552	911	277	297	574	1 485
1Q2015	..	..	..	..	..	..	..	..	..	..
2Q2015	..	..	..	..	..	..	..	..	..	..
3Q2015	..	..	..	..	..	..	..	..	..	..

UNITED STATES

3. Summary electricity production and consumption ⁽¹⁾

(TWh)

	1973	1980	1990	2000	2005	2012	2013	2014p
Gross production	1965.5	2427.3	3218.6	4052.7 e	4294.4	4290.5	4306.2	4331.0
Nuclear	89.2	266.2	611.6	797.7	810.7	801.1	822.0	830.4
Hydro	265.4	278.8	289.0	280.0	297.9	298.3	290.1	281.0
<i>of which:</i>								
<i>pumped storage production</i>	-	-	15.8	26.8	25.5	19.8	19.3	20.1
Geothermal	2.5	5.4	16.0	14.6	16.8	18.1	18.4	18.4
Solar	-	-	0.7	0.7 e	1.1 e	10.0 e	15.7	24.1
Tide, wave, ocean	-	-	-	-	-	-	-	-
Wind	-	-	3.1	5.7	17.9	141.9 e	169.7	184.1
Combustible fuels	1608.5	1877.0	2298.3 e	2954.0 e	3149.3	3019.9	2985.9	2988.9
<i>Coal</i>	907.4	1242.9	1699.6	2129.5	2154.0	1643.4	1712.4	1715.3
<i>Oil</i>	336.0	263.2	130.6	118.5	141.3	33.1	36.9	39.0
<i>Natural gas</i>	364.9	370.5	381.7	634.3	782.8	1264.6	1158.5	1155.7
<i>Biofuels & waste</i>	0.3	0.5	86.4	71.7	71.2	78.9	78.2	62.5
Other (e.g. fuel cells)	-	-	-	-	0.6	1.1	4.4	4.2
- Own use by power plant	100.8	141.2	188.8	235.9 e	206.4	213.3	213.0	..
Net production	1864.7	2286.1	3029.8	3816.7 e	4088.0	4077.2	4093.2	..
Nuclear	..	251.1	577.0	753.9	782.0	769.3	789.0	..
Hydro	..	276.0	286.1	275.0	295.8	296.0	287.8	..
Geothermal	..	5.1	15.1	14.1	14.7	15.6	15.8	..
Solar	..	-	0.7	0.7 e	1.1 e	9.9 e	15.5	..
Tide, wave, ocean	..	-	-	-	-	-	-	..
Wind	..	-	3.0	5.6	17.8	140.8 e	167.8	..
Combustible fuels	..	1753.9	2148.0	2767.5	2976.0	2844.5	2813.3	..
Other (e.g. fuel cells)	..	-	-	-	0.6	1.1	4.0	..
- Used for heat pumps	-	-	-	-	-	-	-	-
- Used for electric boilers	-	-	-	-	-	-	-	-
- Used for pumped storage	-	-	22.6	31.7	32.0	24.7	23.9	26.3
+ Imports	16.8	30.2	22.5	48.6	44.5	59.3	70.4	61.6
- Exports	2.6	3.5	20.5	14.7	19.8	12.0	11.4	13.5
Electrical energy supplied	1878.9	2312.8	3009.2	3818.9 e	4080.6	4099.7	4128.3	..
- Transmission & distr. losses	163.1	213.1	296.7	229.1 e	269.2	268.8	255.3	..
- Statistical difference	-	-	-	-	-	-	-14.8	..
Total consumption	1715.9	2099.8	2712.6	3589.8 e	3811.5	3831.0	3887.7	..
- Energy industry consumption ⁽²⁾	48.6	74.2	79.0	90.3	80.0	104.2	105.6	..
Final consumption	1667.3	2025.5	2633.6	3499.5 e	3731.5	3726.8	3782.2	..
Industry	645.8	746.1	866.5	1142.1	898.2	845.9	846.5	..
Transport	4.3	3.1	4.1	4.4	6.2	6.8	7.2	..
Commercial & publ. serv.	423.5	558.8	838.9	1160.3	1275.1	1323.8	1338.4	..
Residential	579.3	717.5	924.0	1192.4	1359.2	1374.6	1391.0	..
Agriculture & fishing	14.5	-	-	-	41.0	30.8	29.7	..
Sector non specified	-	-	-	0.2 e	151.8	144.9	169.3	..

Source: IEA/OECD Electricity Statistics.

(1) Electricity generation from main activity producer power plants and autoproducers.

(2) Energy industry consumption = electricity consumed by transformation industries for heating, traction and lighting purposes; excludes own use by power plant and electricity used for heat pumps, electric boilers and pumped storage.

Note: Please refer to definitions in the introductory information.

UNITED STATES

Table 3 - Average prices and taxes in US dollars

Steam coal for industry (per tonne)						Steam coal for electricity generation (per tonne)				
	Ex-tax price	Excise tax	Sales tax	Total tax	Total price	Ex-tax price	Excise tax	Sales tax	Total tax	Total price
2004	43.32	..	..	..	..	30.92
2005	52.12	..	..	..	..	35.30
2006	56.99	..	..	..	..	38.76
2007	60.04	..	..	..	..	40.48
2008	69.99	..	..	..	..	47.35
2009	71.54	..	..	..	..	50.47
2010	70.54	..	..	..	..	51.79
2011	71.76	..	..	..	..	54.74
2012	81.37	..	..	..	..	54.52
2013	79.39	..	..	..	..	53.61
2014	80.06	..	..	..	..	54.11
3Q2014	80.19	..	..	..	..	54.23
4Q2014	80.31	..	..	..	..	54.31
1Q2015	76.62	..	..	..	..	51.81
2Q2015	77.90	..	..	..	..	52.68
3Q2015
Steam coal for households (per tonne)						Coking coal for industry (per tonne)				
	Ex-tax price	Excise tax	Sales tax	Total tax	Total price	Ex-tax price	Excise tax	Sales tax	Total tax	Total price
2004	67.85
2005	92.44
2006	102.79
2007	104.77
2008	130.28
2009	158.20
2010	160.84
2011	200.52
2012	202.64
2013	197.72
2014	199.39
3Q2014	199.72
4Q2014	200.01
1Q2015	190.81
2Q2015	194.01
3Q2015
Electricity for industry (per megawatt hour)						Electricity for households (per megawatt hour)				
	Ex-tax price	Excise tax	Sales tax	Total tax	Total price	Ex-tax price	Excise tax	Sales tax	Total tax	Total price
2004	52.7	..	..	..	..	89.7
2005	57.3	..	..	..	..	94.5
2006	61.6	..	..	..	..	104.0
2007	63.9	..	..	..	..	106.5
2008	68.3	..	..	..	..	112.6
2009	68.1	..	..	..	..	115.1
2010	67.9	..	..	..	..	115.8
2011	68.2	..	..	..	..	117.2
2012	66.7	..	..	..	..	118.8
2013	68.4	..	..	..	..	121.2
2014	70.1	..	..	..	..	125.0
3Q2014	73.6	..	..	..	..	130.1
4Q2014	67.6	..	..	..	..	123.8
1Q2015	67.6	..	..	..	..	122.4
2Q2015	68.9	..	..	..	..	130.4
3Q2015

UNITED KINGDOM

3. Summary electricity production and consumption ⁽¹⁾

(TWh)

	1973	1980	1990	2000	2005	2012	2013	2014p
Gross production	282.0	285.3	319.7	377.1	398.4	363.4	359.2	335.0
Nuclear	28.0	37.0	65.7	85.1	81.6	70.4	70.6	63.7
Hydro	4.6	5.1	7.2	7.8	7.9	8.3	7.6	8.8
<i>of which:</i>								
<i>pumped storage production</i>	0.7	1.2	2.0	2.7	2.9	3.0	2.9	2.8
Geothermal	-	-	-	-	-	-	-	-
Solar	-	-	-	0.0	0.0	1.4	2.0	3.9
Tide, wave, ocean	-	-	-	-	-	0.0	0.0	0.0
Wind	-	-	0.0	0.9	2.9	19.7	28.4	31.6
Combustible fuels	249.5	243.2	246.8	283.3	306.0	263.7	250.5	227.0
<i>Coal</i>	174.6	207.9	206.4 e	122.3	136.3	144.2	131.9	98.3
<i>Oil</i>	72.2	33.1	34.7 e	8.4	5.3	2.6	2.1	2.0
<i>Natural gas</i>	2.7	2.1	5.0 e	148.1	152.6	100.2	95.6	101.1
<i>Biofuels & waste</i>	-	-	0.7	4.5	11.7	16.8	20.8	21.9
Other (e.g. fuel cells)	-	-	-	-	-	-	-	-
- Own use by power plant	19.2	19.0	19.6	16.3	17.9	17.9	17.9	..
Net production	262.9	266.3	300.1	360.8	380.5	345.5	341.3	..
Nuclear	..	32.3	58.7	78.3	75.2	63.9	64.1	..
Hydro	..	5.1	7.1	7.7	7.5	8.2	7.6	..
Geothermal	..	-	-	-	-	-	-	..
Solar	..	-	-	0.0	0.0	1.4	2.0	..
Tide, wave, ocean	..	-	-	-	-	0.0	0.0	..
Wind	..	-	0.0	0.9	2.9	19.7	28.4	..
Combustible fuels	..	228.9	234.4	273.8 e	294.9	252.3	239.1	..
Other (e.g. fuel cells)	..	-	-	-	-	-	-	..
- Used for heat pumps	-	-	-	-	-	-	-	-
- Used for electric boilers	-	-	-	-	-	-	-	-
- Used for pumped storage	0.9	1.5	2.6	3.5	3.7	4.0	3.9	3.8
+ Imports	0.2	0.0	12.0	14.3	11.2	13.7	17.5	23.2
- Exports	0.1	0.0	0.0	0.1	2.8	1.9	3.1	2.7
Electrical energy supplied	262.1	264.9	309.4	371.4	385.1	353.4	351.8	..
- Transmission & distr. losses	19.6	21.5	25.0	31.1	27.9	28.0	26.8	..
- Statistical difference	-	-	-	-	0.0	0.0	0.0	..
Total consumption	242.5	243.3	284.4	340.3	357.2	325.4	324.9	..
- Energy industry consumption ⁽²⁾	9.4	9.0	10.0	10.9	8.5	7.5	7.6	..
Final consumption	233.1	234.3	274.4	329.4	348.7	317.8	317.3	..
Industry	91.3	87.3	100.6	114.1	116.0	97.8	98.0	..
Transport	2.6	3.0	5.3	8.6	4.1	4.1	4.1	..
Commercial & publ. serv.	43.9	53.9	70.9	90.5	98.9	97.3	97.9	..
Residential	91.3	86.1	93.8	111.8	125.7	114.8	113.5	..
Agriculture & fishing	4.0	4.0	3.8	4.4	4.0	3.9	3.9	..
Sector non specified	-	-	-	-	-	-	-	..

Source: IEA/OECD Electricity Statistics.

(1) Electricity generation from main activity producer power plants and autoproducers.

(2) Energy industry consumption = electricity consumed by transformation industries for heating, traction and lighting purposes; excludes own use by power plant and electricity used for heat pumps, electric boilers and pumped storage.

Note: Please refer to definitions in the introductory information.

UNITED KINGDOM
Table 3 - Average prices and taxes in UK pounds

Steam coal for industry (per tonne)						Steam coal for electricity generation (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	37.88	4.57	-	4.57	42.45	32.61	-	-	-	32.61
2005	44.57	4.57	-	4.57	49.14	36.07	-	-	-	36.07
2006	43.63	4.68	-	4.68	48.31	38.06	-	-	-	38.06
2007	46.49	4.32	-	4.32	50.81	41.16	-	-	-	41.16
2008	59.64	4.27	-	4.27	63.91	65.57	-	-	-	65.57
2009	59.60	4.27	-	4.27	63.87	54.42	-	-	-	54.42
2010	70.90	5.08	-	5.08	75.98	62.30	-	-	-	62.30
2011	87.03	6.23	-	6.23	93.26	80.14	-	-	-	80.14
2012	87.54	6.27	-	6.27	93.80	66.33	-	-	-	66.33
2013	94.59	6.77	-	6.77	101.36	61.55	-	-	-	61.55
2014	93.64	6.70	-	6.70	100.35	56.70	-	-	-	56.70
3Q2014	87.75	6.78	-	6.78	94.54	55.41	-	-	-	55.41
4Q2014	94.31	7.29	-	7.29	101.60	56.22	-	-	-	56.22
1Q2015	82.30	6.36	-	6.36	88.67	51.97	-	-	-	51.97
2Q2015	..	..	..	..	..	..	..	..	..	..
3Q2015	..	..	..	..	..	..	..	..	..	..
Steam coal for households (per tonne)						Coking coal for industry (per tonne)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	157.99	-	7.90	7.90	165.89	..	..	..	..	..
2005	179.06	-	8.95	8.95	188.02	..	..	..	..	..
2006	193.57	-	9.68	9.68	203.25	..	..	..	..	..
2007	208.52	-	10.43	10.43	218.95	..	..	..	..	..
2008	249.54	-	12.48	12.48	262.02	..	..	..	..	..
2009	293.65	-	14.68	14.68	308.33	..	..	..	..	..
2010	294.62	-	14.73	14.73	309.35	..	..	..	..	..
2011	305.89	-	15.29	15.29	321.18	..	..	..	..	..
2012	316.83	-	15.84	15.84	332.67	..	..	..	..	..
2013	322.08	-	16.10	16.10	338.18	..	..	..	..	..
2014	330.00	-	16.50	16.50	346.50	..	..	..	..	..
3Q2014	326.92	-	16.35	16.35	343.27	..	..	..	..	..
4Q2014	334.48	-	16.72	16.72	351.20	..	..	..	..	..
1Q2015	332.44	-	16.62	16.62	349.07	..	..	..	..	..
2Q2015	326.35	-	16.32	16.32	342.67	..	..	..	..	..
3Q2015	..	..	..	..	..	..	..	..	..	..
Electricity for industry (per megawatt hour)						Electricity for households (per megawatt hour)				
	Ex-tax price	Excise tax	VAT	Total tax	Total price	Ex-tax price	Excise tax	VAT	Total tax	Total price
2004	34.0	2.4	-	2.4	36.4	71.6	-	3.6	3.6	75.2
2005	45.6	2.2	-	2.2	47.7	78.8	-	3.9	3.9	82.7
2006	61.2	2.3	-	2.3	63.5	92.7	-	4.6	4.6	97.4
2007	62.8	2.1	-	2.1	64.9	97.3	-	4.9	4.9	102.2
2008	77.3	2.4	-	2.4	79.7	113.3	-	5.7	5.7	118.9
2009	83.4	2.7	-	2.7	86.1	116.8	-	5.8	5.8	122.6
2010	75.7	2.7	-	2.7	78.4	113.4	-	5.7	5.7	119.1
2011	78.1	2.7	-	2.7	80.8	124.3	-	6.2	6.2	130.5
2012	82.1	2.6	-	2.6	84.7	130.9	-	6.5	6.5	137.4
2013	86.5	2.5	-	2.5	88.9	140.2	-	7.0	7.0	147.2
2014	91.3	2.5	-	2.5	93.8	148.2	-	7.4	7.4	155.6
3Q2014	90.2	2.3	-	2.3	92.5	147.9	-	7.4	7.4	155.3
4Q2014	91.9	2.5	-	2.5	94.5	147.9	-	7.4	7.4	155.3
1Q2015	91.8	2.2	-	2.2	94.0	147.9	-	7.4	7.4	155.3
2Q2015	..	..	..	..	..	147.6	-	7.4	7.4	155.0
3Q2015	..	..	..	..	..	..	..	..	..	..