

CHAPTER 6

Wisconsin and U.S. Prices and Average Costs of Fuels

Wisconsin is a National Leader in Alternative Fueled Vehicles



Wisconsin has a long history of support for efforts around alternative fueled vehicles and the development of the supporting infrastructure. The portfolio of alternative fuels used for transportation in the state includes: ethanol, blended with gasoline to produce either E10 or E85; biodiesel; natural gas, which can be compressed (CNG), liquefied (LNG) or biogas (bioCNG); propane; and electricity.

In 2009, the US Department of Energy awarded Wisconsin \$15 million for the Clean Transportation Program—a statewide effort to

increase the deployment of alternative fueled vehicles. This effort helped to fund municipalities, state agencies and private business to purchase vehicles and install re-fueling stations. Overall, 377 vehicles were purchased with 22 public and private refueling sites, displacing more than 2.26 million gallons of conventional fossil-fuel gasoline and diesel.

Currently, Wisconsin is focusing alternative fuel efforts on compressed natural gas (CNG) and compressed renewable natural gas (bioCNG). Low prices of natural gas across the country have spurred Wisconsin-based fleets to incorporate CNG vehicles, seeing significant savings in fuel costs and reductions in emissions.

In addition to displacing imported fossil fuels and reducing emissions, alternative fuels provide economic benefit to the United States through the consumption of domestically-produced fuels such as ethanol and natural gas.



Focus on CNG

Wisconsin is home to 51 public and private CNG refueling stations, with one new station opening every three weeks, on average.

In calendar year 2012, Wisconsinites consumed 1,421,804 gasoline gallon equivalents (GGEs) for transportation. In 2013, this number increased by 156% to 3,646,398 GGEs.

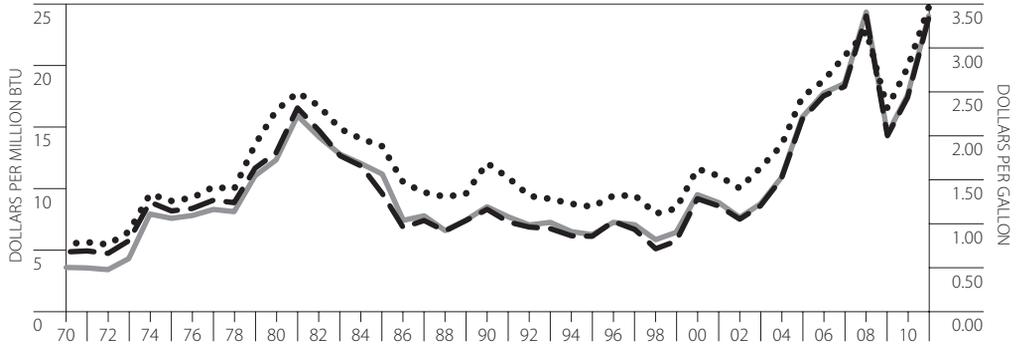
Wisconsin has invested a total of \$8,863,340 on CNG for transportation in federal energy program funding for 177 vehicles (\$3,677,598) and 14 refueling stations (\$5,185,742). Of the CNG refueling stations, two are bioCNG. While conventional CNG is a fossil fuel, bioCNG is sourced from a biodigester, a waste water treatment facility, or landfill. The Dane County landfill and the the Janesville waste water treatment plant provide bioCNG refueling.

Wisconsin Energy Prices

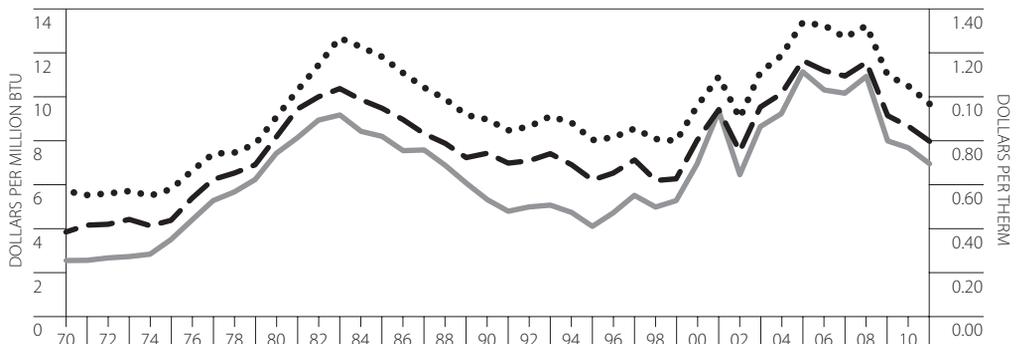
.....
RESIDENTIAL
- - - -
COMMERCIAL
—————
INDUSTRIAL

Historical prices can be presented in two ways—the current or nominal price, which was gathered during that year. The real or constant price which uses Gross Domestic Product price deflator for inflation. In other words, actual prices are adjusted to be comparable to 2011 prices, in “real” terms, with the effects of inflation removed. All prices are reported in current or nominal terms unless noted explicitly as being real, constant or adjusted.

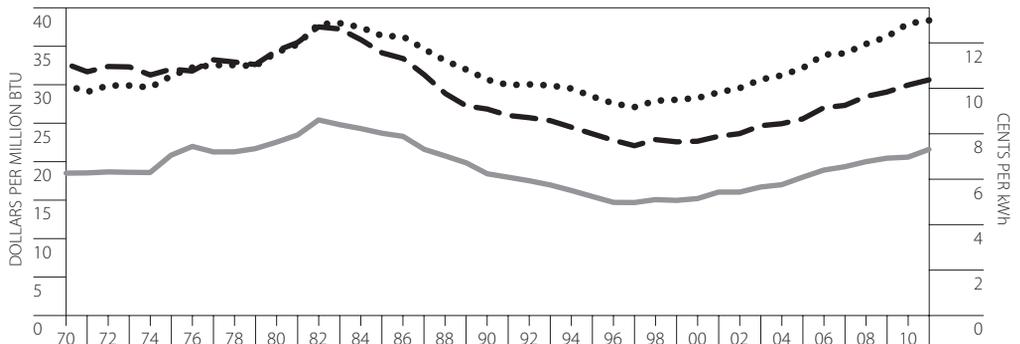
1970-2011 DISTILLATE PRICES (2011 DOLLARS)



1970-2011 NATURAL GAS PRICES (2011 DOLLARS)



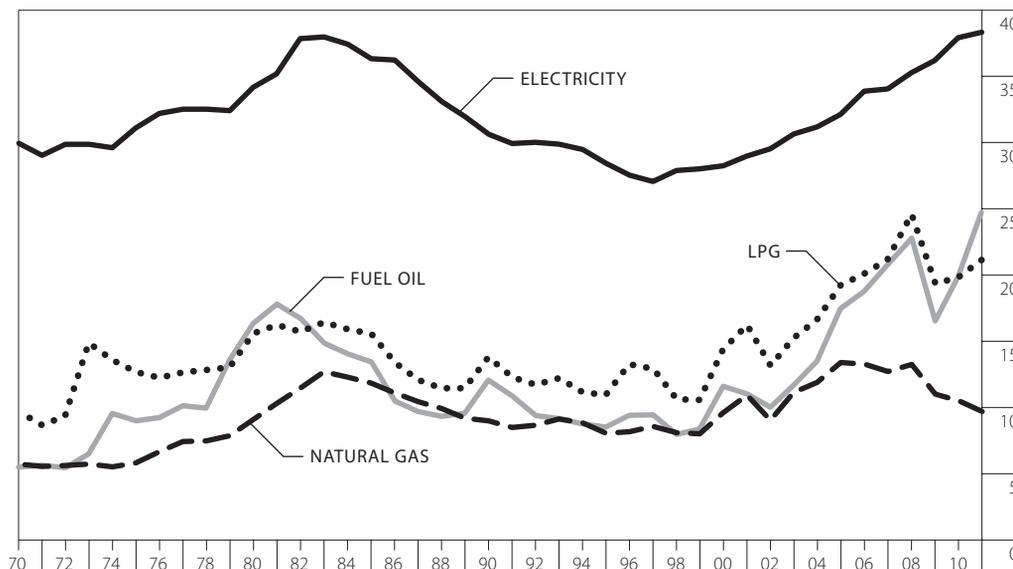
1970-2011 ELECTRICITY PRICES (2011 DOLLARS)



Source: Wisconsin State Energy Office.

Wisconsin Residential Energy Prices, by Type of Fuel

1970-2011 DOLLARS PER MILLION BTU (2011 DOLLARS)



1970-2011 DOLLARS PER MILLION BTU

Year	Current Dollars				2011 Dollars ^a			
	Fuel Oil	LPG	Natural Gas	Electricity	Fuel Oil	LPG	Natural Gas	Electricity
1970	1.17	2.07	1.22	6.42	5.45	9.64	5.68	29.89
1975	2.65	3.74	1.71	9.20	8.94	12.62	5.77	31.05
1980	6.87	6.55	3.81	14.39	16.30	15.54	9.04	34.12
1985	7.28	8.43	6.41	19.72	13.39	15.51	11.79	36.27
1990	7.65	8.75	5.70	19.48	12.00	13.73	8.94	30.57
1995	6.10	7.84	5.76	20.42	8.47	10.89	8.00	28.37
2000	9.03	11.22	7.48	22.06	11.54	14.34	9.56	28.19
2005	15.37	16.92	11.77	28.30	17.43	19.18	13.34	32.08
2006	17.04	18.26	12.04	30.79	18.72	20.05	13.22	33.82
2007	19.43	19.80	11.86	31.85	20.73	21.13	12.66	33.99
2008	21.73	23.43	12.63	33.72	22.68	24.46	13.19	35.21
2009	15.87	18.67	10.61	34.98	16.40	19.29	10.96	36.14
2010 ^r	19.40	19.36	10.24	37.06	19.81	19.77	10.46	37.86
2011 ^p	24.69	21.09	9.65	38.27	24.69	21.09	9.65	38.27

^a 2011 dollar values computed with Gross National Product Implicit Price Deflator. See the last page in this chapter with the table on price indices.

^p Preliminary estimates.

^r Revised.

Source: U.S. Department of Energy, *State Btu Unit Price Data Base*, unpublished (May 1981); Wisconsin State Energy Office, periodic telephone surveys of fuel oil and LP gas distributors and natural gas and electricity price monitoring reports (2001-2011); American Gas Association, *Gas Facts* (1971-2001); Edison Electric Institute, *Statistical Year Book* (1971-2003); Public Service Commission of Wisconsin, PSC AF 2, Docket 05-GF-159 (2001-2011); U.S. Department of Energy/Energy Information Administration, *Natural Gas Annual* [DOE/EIA-0131(12)] (March 2012).

REAL PRICE
IN 2011 DOLLARS

FUEL OIL

24.6%

LPG

6.7%

ELECTRICITY

1.1%

In 2011, the real prices (2011 dollars) of residential energy fuels increased for fuel oil and liquefied petroleum gas (LPG) by 24.6 and 6.7 percent respectively. Electricity prices increased by 1.1 percent.

REAL PRICE
IN 2011 DOLLARS

NATURAL GAS

7.7%

Natural gas decreased by 7.7 percent. The last four columns in the table show the prices after adjusting for inflation.

In 2011 dollars, natural gas prices have decreased by 27.7 percent over the 2005 peak price of \$13.34/MMBtu. The 2011 electric price continue a trend of increasing prices since 1997.

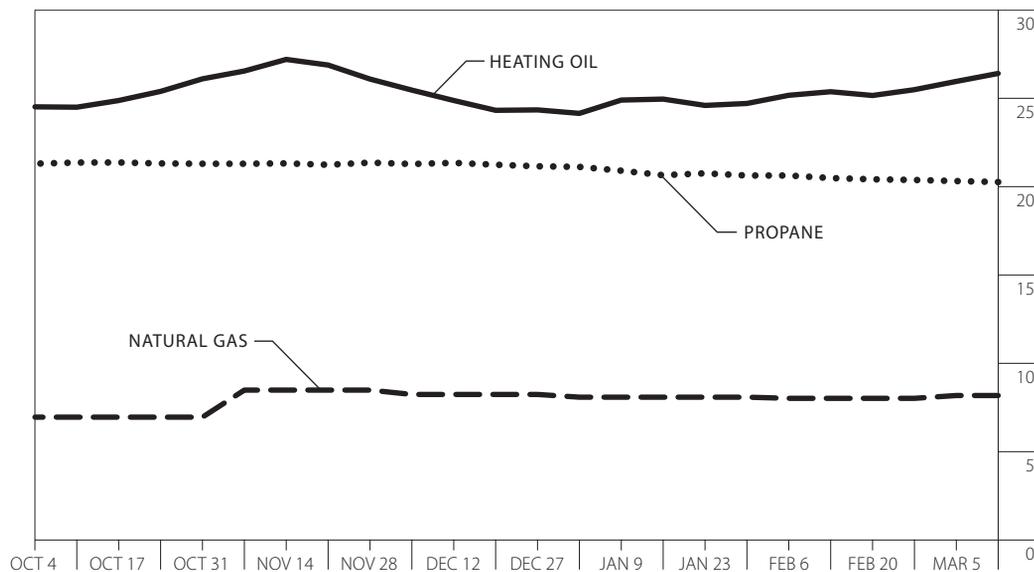
Wisconsin Residential Energy Prices, by Type of Fuel, Winter Heating Season

For the 2011-2012 winter heating season, propane prices peaked at the beginning of the heating season in October, while heating oil and natural gas prices peaked one month later in November.

Natural gas pricing data presented here are different from other data in this book due to difference in data source and duration of the average. Heating Oil and LP data are from a weekly survey of federally-identified fuel wholesalers and retailers; data elsewhere in the book are derived from Public Service Commission utility data and the federal Energy Information Administration.

Most prices in the book are for the entire calendar year, while this is for the heating season (October – March).

2011-2012 DOLLARS PER MILLION BTU



2011-2012 DOLLARS PER GALLON AND DOLLARS PER MILLION BTU

Date	Heating Oil ^a		Propane ^b		Natural Gas
	\$/Gallon	\$/MMBtu	\$/Gallon	\$/MMBtu	\$/MMBtu
2011-2012					
Oct. 4, 2011	3.40	24.52	2.03	21.30	6.95
Oct. 17, 2011	3.45	24.87	2.04	21.37	6.95
Oct. 31, 2011	3.62	26.10	2.03	21.29	6.95
Nov. 14, 2011	3.77	27.20	2.04	21.32	8.48
Nov. 28, 2011	3.62	26.09	2.04	21.36	8.48
Dec. 12, 2011	3.45	24.88	2.04	21.34	8.24
Dec. 27, 2011	3.38	24.34	2.02	21.15	8.24
Jan. 9, 2012	3.45	24.90	2.00	20.90	8.08
Jan. 23, 2012	3.41	24.60	1.98	20.75	8.08
Feb. 6, 2012	3.49	25.17	1.97	20.63	8.02
Feb. 20, 2012	3.49	25.16	1.95	20.41	8.02
Mar. 5, 2012	3.60	25.96	1.94	20.32	8.18
Average Price for the Heating Season	3.51	25.33	2.00	20.97	7.94

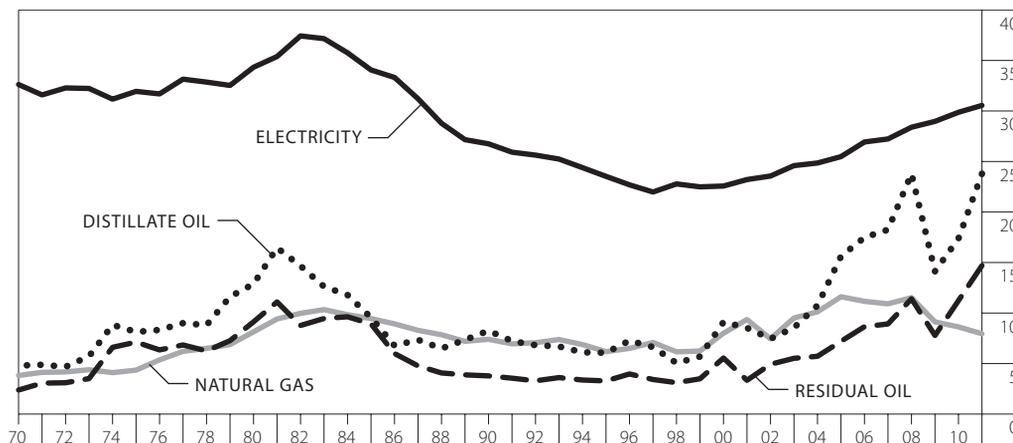
^a Heating Oil contains 0.138690 MMBtu/gallon.

^b Propane contains 0.095475 MMBtu/gallon.

Source: Telephone survey of energy retailers conducted by the Wisconsin State Energy Office throughout the winter heating season, starting October 4, 2011 and ending March 12, 2012; Wisconsin Natural Gas utility websites and public pricing information (2009-2012).

Wisconsin Commercial Energy Prices, by Type of Fuel

1970-2011 DOLLARS PER MILLION BTU (2011 DOLLARS)



1970-2011 DOLLARS PER MILLION BTU

Year	Current Dollars				2011 Dollars ^a			
	Distillate Oil ^c	Residual Oil ^{b,c}	Natural Gas	Electricity	Distillate Oil ^c	Residual Oil ^{b,c}	Natural Gas	Electricity
1970	1.03	0.51	0.82	7.00	4.80	2.38	3.82	32.62
1975	2.41	2.11	1.29	9.46	8.13	7.12	4.35	31.94
1980	5.43	3.85	3.43	14.47	12.88	9.13	8.14	34.33
1982	7.17	4.29	4.88	18.31	14.66	8.77	9.97	37.43
1985	5.19	4.85	5.14	18.52	9.55	8.92	9.45	34.06
1990	5.26	2.41	4.72	17.05	8.25	3.78	7.40	26.75
1995	4.37	2.36	4.45	16.94	6.07	3.28	6.18	23.53
2000	7.13	4.34	6.26	17.67	9.11	5.55	8.00	22.57
2005	13.77	6.35	10.24	22.47	15.61	7.20	11.61	25.48
2010 ^e	17.01	11.00	8.45	29.24	17.37	11.23	8.63	29.87
2011 ^p	23.79	14.70	7.95	30.55	23.79	14.70	7.95	30.55

a 2011 dollar values computed with Gross National Product Implicit Price Deflator. See the last page in this chapter with the table on price indices.
b Beginning in 2009, the residual fuel oil price is for the Petroleum Administration Defense District (PADD) II. The PADD II includes 15 Midwestern states including Wisconsin. State-specific pricing data for RFO is withheld or not available according to publishing policies used by the Energy Information Administration (EIA).
c Beginning in 2011, the distillate oil price is estimated based on the refiner retail price in Wisconsin. The price for residual oil is estimated based on refiner retail prices for the United States. The reports previously used by the Wisconsin SEO were suspended as part of EIA's response to the U.S. budget sequester.
e Estimate.
p Preliminary estimates.

Source: U.S. Department of Energy, "State Btu Unit Price Data Base", unpublished (May 1981); *Petroleum Marketing Monthly*, (January 1985 - March 2008), and unpublished analysis of Wisconsin residual oil prices (1985-2006); American Gas Association, *Gas Facts* (1971-2001); Edison Electric Institute, *Statistical Year Book* (1971-2001); U.S. Department of Energy, *Electric Sales and Revenue 1993-1997* [DOE/EIA-0540 (97)] (December 1999); *Electric Power Monthly* [DOE/EIA-0226 (03/10)] (March 2010); *Natural Gas Annual*, (1994-2008) [DOE/EIA-0131(12)] (March 2012); *Natural Gas Monthly*, (1994-2012) [DOE/EIA-0130(2012/03)] (March 2012); *Petroleum Marketing Annual* (2007-2009) [DOE/EIA-0487 (2009)] (August 2010), Tables 35 and 38; *Oil Daily/Daily Oil and Gas Price Review*, by subscription (2008-2009); *Wisconsin No. 2 Distillate Retail Sales by Refiners* (2011); *U.S. Residual Fuel Oil Sales by Refiners* (2011).

REAL PRICE
IN 2011 DOLLARS

DISTILLATE OIL

37.0%

RESIDUAL OIL

30.9%

ELECTRICITY

2.3%

In 2011, the real price of all fuels (in 2011 dollars) except natural gas increased: distillate oil (37.0 percent), residual oil (30.9 percent) and electricity (2.3 percent).

REAL PRICE
IN 2011 DOLLARS

NATURAL GAS

7.9%

The real price of natural gas decreased by 7.9 percent. Electricity, the major energy expense in the commercial sector, is 18.4 percent lower than its 1982 peak price, adjusted for inflation.

Wisconsin Industrial Energy Prices, by Type of Fuel

REAL PRICE
IN 2011 DOLLARS

COAL
0.9%
DISTILLATE OIL
36.7%
RESIDUAL OIL
30.9%
ELECTRICITY
4.9%

In 2011, the real prices of all industrial fuels, except natural gas, increased. Coal increased by 0.9 percent, distillate oil by 36.7 percent, residual oil by 30.9 percent, and electricity by 4.9 percent, over 2010.

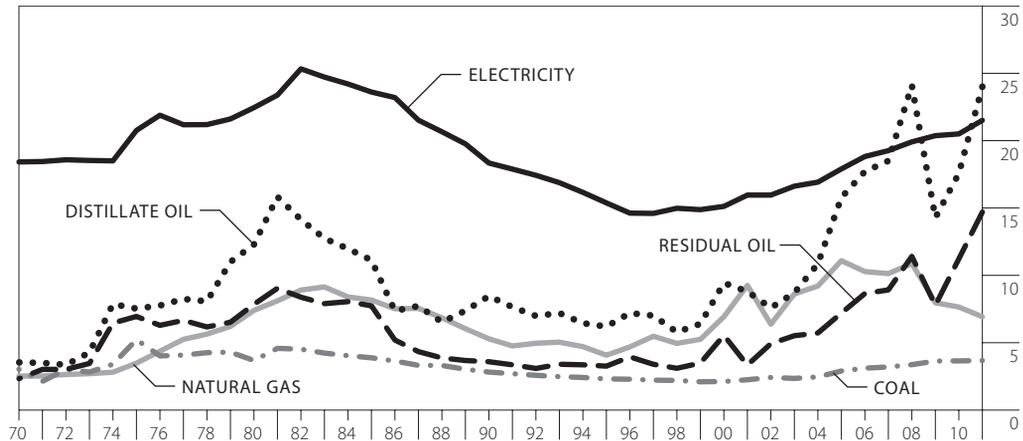
REAL PRICE
IN 2011 DOLLARS

NATURAL GAS
9.4%

The price for natural gas dropped by 9.4 percent.

The real price of coal and electricity are 19.6 and 15.1 percent lower than their respective 1981 and 1982 price peaks, adjusted for inflation.

1970-2011 DOLLARS PER MILLION BTU (2011 DOLLARS)



1970-2011 DOLLARS PER MILLION BTU

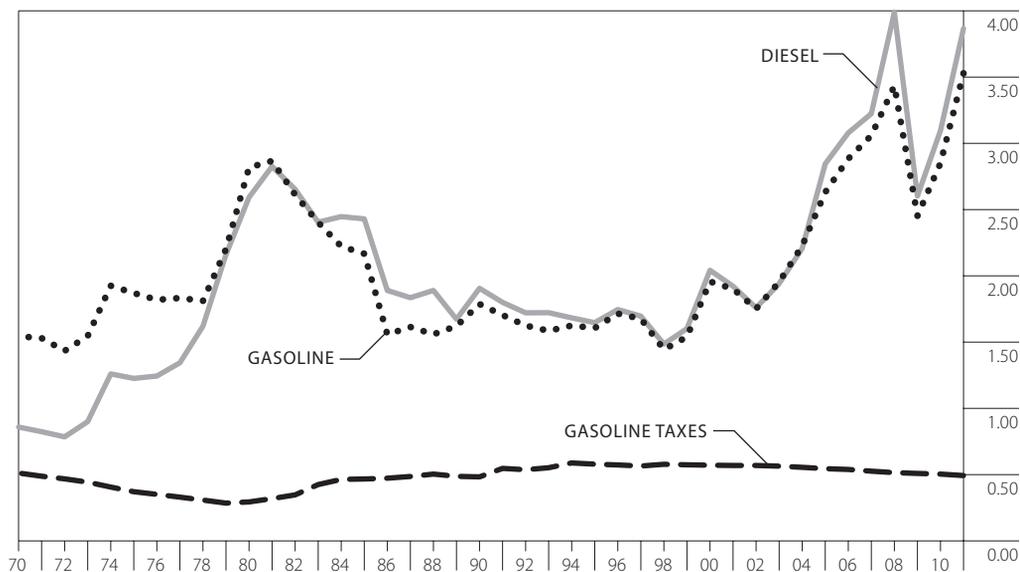
Year	Current Dollars					2011 Dollars ^a				
	Distillate Oil ^c	Residual Oil ^{b,c}	Natural Gas	Coal	Electricity	Distillate Oil ^c	Residual Oil ^{b,c}	Natural Gas	Coal	Electricity
1970	0.76	0.50	0.54	0.65	3.96	3.54	2.33	2.52	3.03	18.42
1975	2.23	2.06	1.03	1.55	6.15	7.53	6.95	3.48	5.23	20.76
1980	5.18	3.31	3.12	1.55	9.46	12.29	7.85	7.40	3.68	22.45
1981	7.30	4.17	3.74	2.11	10.78	15.83	9.04	8.11	4.58	23.38
1982	6.92	4.10	4.36	2.21	12.39	14.14	8.38	8.91	4.52	25.33
1985	6.05	4.21	4.44	2.11	12.83	11.13	7.74	8.17	3.88	23.61
1990	5.39	2.29	3.37	1.80	11.69	8.46	3.59	5.29	2.82	18.34
1995	4.46	2.35	2.93	1.66	11.08	6.20	3.26	4.07	2.31	15.38
2000	7.39	4.34	5.42	1.66	11.84	9.44	5.55	6.93	2.12	15.12
2005	13.92	6.35	9.78	2.56	15.79	15.78	7.20	11.09	2.90	17.90
2010 ^e	17.20	11.00	7.49	3.57	20.07	17.57	11.23	7.65	3.65	20.50
2011 ^{p,e}	24.01	14.70	6.93	3.68	21.51	24.01	14.70	6.93	3.68	21.51

- a 2011 dollar values computed with Gross National Product Implicit Price Deflator. See the last page in this chapter with the table on price indices.
- b Beginning in 2009, the residual fuel oil price is for the Petroleum Administration Defense District (PADD) II. The PADD II includes 15 midwestern states including Wisconsin. State-specific pricing data for RFO is withheld or not available according to publishing policies used by the Energy Information Administration (EIA).
- c Beginning in 2011, the distillate oil price is estimated based on the refiner retail price in Wisconsin. The price for residual oil is estimated based on refiner retail prices for the United States. The reports previously used by the Wisconsin SEO were suspended as part of EIA's response to the U.S. budget sequester.
- e Estimate.
- p Preliminary estimates.

Source: U.S. Department of Energy, "State Btu Unit Price Data Base", unpublished (May 1981); *State Energy Consumption, Price and Expenditure Report 1960-2008* http://www.eia.doe.gov/emeu/states/_seds.html, (June 2010); *Petroleum Marketing Monthly* (January 1985-March 2008); *Quarterly Coal Report*, Table 27 [DOE/EIA-0121 (2009/4Q)] (April 2010), <http://www.eia.doe.gov/cneaf/coal/quarterly/qcr.pdf>; *Natural Gas Annual*, (1994-2012) [DOE/EIA-0131(12)] (March 2012); and *Natural Gas Monthly*, (1994-2009) [DOE/EIA-0130(2012/03)] (March 2012); *Petroleum Marketing Annual* (2007-2009) [DOE/EIA-0487 (2009)] (August 2010), Tables 35 and 38; *Oil Daily/Daily Oil and Gas Price Review*, by subscription (2008-2009); *Wisconsin No. 2 Distillate Retail Sales by Refiners* (2011); *U.S. Residual Fuel Oil Sales by Refiners* (2011).

Wisconsin Motor Gasoline and Diesel Fuel Retail Prices, by Grade and Type of Service

1970-2011 DOLLARS PER GALLON (2011 DOLLARS)



REAL PRICE
IN 2011 DOLLARS
GASOLINE
23.8%
FROM 2010

The real price of gasoline in 2011 was 23.8 percent higher than in 2010. Real gasoline prices in 2011 were the highest on record since data for this book were compiled in 1970. The real price of diesel fuel increased by 24.9 percent since 2010.

Starting on January 1, 1995, only reformulated gasoline could be sold in Wisconsin's Nonattainment Area—10 eastern and southeastern Wisconsin counties^d—in order to improve air quality.

1970-2011 DOLLARS PER GALLON

Year	Current Dollars			2011 Dollars			
	Regular Unleaded Gasoline (Self-Service) ^a	Regular Reformulated Gasoline	Diesel Fuel ^b	Federal and State Taxes on Gasoline ^c	Regular Unleaded Gasoline (Self-Service) ^a	Diesel Fuel ^b	Federal and State Taxes on Gasoline ^c
1970	0.332		0.185	0.110	1.544	0.859	0.512
1975	0.554		0.363	0.110	1.870	1.226	0.371
1980	1.188		1.093	0.124	2.818	2.593	0.294
1985	1.178		1.321	0.254	2.167	2.430	0.467
1990	1.139		1.215	0.308	1.787	1.906	0.483
1995	1.156	1.181	1.186	0.417	1.606	1.647	0.579
2000	1.532	1.556	1.598	0.447	1.957	2.042	0.571
2005	2.321	2.338	2.510	0.481	2.631	2.845	0.545
2006	2.626	2.639	2.804	0.491	2.884	3.079	0.539
2007	2.867	2.849	3.021	0.493	3.059	3.224	0.526
2008	3.289	3.085	3.821	0.493	3.434	3.989	0.515
2009	2.374	2.384	2.518	0.493	2.453	2.602	0.509
2010	2.791	2.784	3.032	0.493	2.851	3.096	0.504
2011	3.529	3.517	3.867	0.493	3.529	3.867	0.493

^a Since 1991, more than 99 percent of the gasoline sold in Wisconsin has been unleaded. The price is for full service gasoline until 1979 when the price is changed to represent self-service gasoline.

^b From 1970 to 1988, the price is the full service price. Beginning in 1989 the price is the self-service price.

^c A state petroleum inspection fee is also charged. In 2011, this fee was 3 cents per gallon.

^d Nonattainment Areas are a designation of the federal Environmental Protection Agency. See <http://www.epa.gov/oaqps001/greenbk/anc1.html> for additional information.

Source: Wisconsin Division of the American Automobile Association, *Fuel Gauge Report* (1993-2011).

Wisconsin Gasoline Prices Relative to the United States and the Midwest

IN 2011 WISCONSIN GAS PRICES WERE 0.62% HIGHER THAN THE MIDWEST AVERAGE, AND 0.72% HIGHER THAN THE U.S. NATIONAL AVERAGE

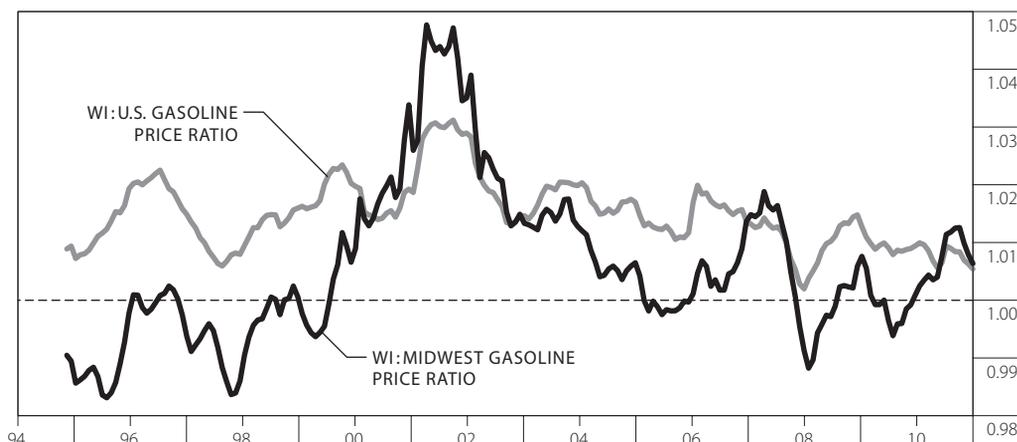
Since 2000, the retail price of conventional gasoline in Wisconsin averages 1.1 percent higher than the national average, and 1.5 percent higher than the Midwest^a.

The difference in cost between Wisconsin and the U.S., and Wisconsin and the Midwest, is highly dependent on the variable cost of gasoline.

These price averages do not include local or national taxes.

This graph shows the relationship of Wisconsin gasoline prices to the U.S. average gasoline prices, and also to gasoline prices in the Midwest. A value above 1 means that the Wisconsin price is more than the U.S. or the Midwest average price, and value below 1 means that the Wisconsin price is less than the U.S. or Midwest average price. A value of 1 means that the Wisconsin price is equal to the national or Midwest average price. These data are presented in a 12-point moving average.

1994-2011 RATIO OF WI TO U.S., AND TO MIDWEST, CONVENTIONAL RETAIL GAS PRICES



1994-2011 RETAIL SALES OF CONVENTIONAL GASOLINE, DOLLARS PER GALLON^b

Year	U.S.	Midwest ^a	Wisconsin
1994	0.722	0.709	0.715
1995	0.748	0.729	0.740
2000	1.066	1.072	1.088
2001	0.992	1.009	1.039
2002	0.922	0.926	0.943
2003	1.107	1.103	1.124
2004	1.389	1.374	1.395
2005	1.803	1.779	1.799
2006	2.083	2.058	2.096
2007	2.310	2.317	2.349
2008	2.746	2.711	2.716
2009	1.858	1.846	1.865
2010	2.287	2.270	2.293
2011	3.015	3.019	3.039

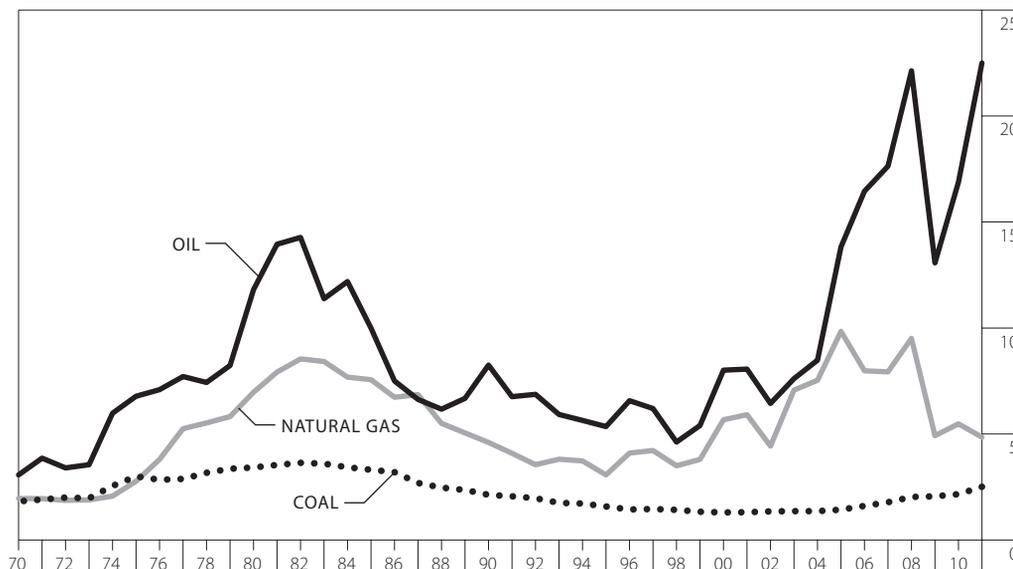
^a Midwestern states in this dataset include all states in the PADD 2 district: Illinois, Indiana, Iowa, Kansas, Kentucky, Michigan, Minnesota, Missouri, Nebraska, North Dakota, Ohio, Oklahoma, South Dakota, Tennessee, and Wisconsin.

^b Figures in the table represent averages calculated from monthly prices. The graph plots monthly data. The background dataset is available on request.

Source: Energy Information Administration, *Gasoline Prices by Formulation, Grade, Sales Type* (1994-2010), http://www.eia.gov/dnav/pet/pet_pri_allmg_a_EPM0U_PTA_dpgal_m.htm; Energy Information Administration, *Gasoline and Diesel Fuel Update* (2011) <http://www.eia.gov/petroleum/gasdiesel/>.

Wisconsin Electric Utility Average Costs of Fuel

1970-2011 DOLLARS PER MILLION BTU (2011 DOLLARS)



1970-2011 DOLLARS PER MILLION BTU

Year	Current Dollars ^{b,c}			2011 Dollars ^a		
	Oil	Natural Gas	Coal	Oil	Natural Gas	Coal
1970	0.66	0.42	0.39	3.07	1.96	1.82
1975	2.01	0.82	0.89	6.78	2.77	3.00
1980	4.98	2.94	1.44	11.81	6.97	3.42
1982	6.98	4.18	1.78	14.27	8.54	3.64
1985	5.43	4.11	1.80	9.99	7.56	3.31
1990	5.26	2.93	1.36	8.25	4.60	2.13
1995	3.85	2.21	1.14	5.35	3.07	1.58
2000	6.27	4.44	1.02	8.01	5.67	1.30
2005	12.19	8.68	1.26	13.82	9.84	1.43
2006	14.98	7.27	1.47	16.45	7.98	1.61
2007	16.52	7.43	1.67	17.63	7.93	1.78
2008	21.20	9.11	1.94	22.13	9.51	2.03
2009 ^r	12.65	4.76	1.99	13.07	4.92	2.06
2010	16.53	5.37	2.11	16.88	5.48	2.16
2011 ^p	22.50	4.85	2.51	22.50	4.85	2.51

^a 2011 dollar values computed with Gross National Product Implicit Price Deflator. See the last page in this chapter with the table on price indices.

^b Beginning in 1988, the U.S. DOE data source has been used.

^c Beginning in 1990, Statistical Yearbook natural gas data has been used.

^p Preliminary estimates.

^r Revised.

Source: Edison Electric Institute, *Statistical Yearbook* (1971-1996); American Gas Association, *Gas Facts* (1971-1990); U.S. Department of Energy, Energy Information Administration, *Electric Power Annual*, 1990-2000, [DOE/EIA-0348(2000)/1] (August 2001); *Electric Power Monthly*, Table 4.10B, 4.11B, and 4.13B [DOE/EIA-0226(2012/02) (February 2012)] www.eia.gov/cneaf/electricity/epm/epm_sum.html

REAL COST IN 2011 DOLLARS

COAL
16.5%

OIL
33.3%

REAL COST IN 2011 DOLLARS

NATURAL GAS
11.6%

In 2011, the real cost (2011 dollars) of coal used as electric utility fuel increased 16.5 percent. The utility cost of natural gas decreased 11.6 percent. Oil prices increased 33.3 percent. Adjusted for inflation, coal prices are 31.0 percent down from their peak in 1982. Natural gas prices peaked in 2005. Oil prices peaked in 2011. Coal remains the lowest cost electric utility fossil fuel.

Wisconsin Electric Utility Coal Costs and Sulfur Content of Coal, by Utility Plant

WISCONSIN
UTILITY COAL HAS

65%

LESS SULFUR AND
COSTS

3.6%

LESS

IN CENTS PER MMBTU
THAN THE
AVERAGE COAL
USED IN THE U.S.

Wisconsin utility coal has 65 percent less sulfur and costs 3.6 percent less, in cents per MMBtu, than the average coal used in the United States. Wisconsin utilities have been very successful in meeting and maintaining the 1993 goals of Wisconsin's acid rain control law through increased use of low sulfur coal. In 2011, the average Wisconsin coal cost, in cents per million Btu, increased 15.2 percent, while sulphur content increased 13.5 percent.

2011

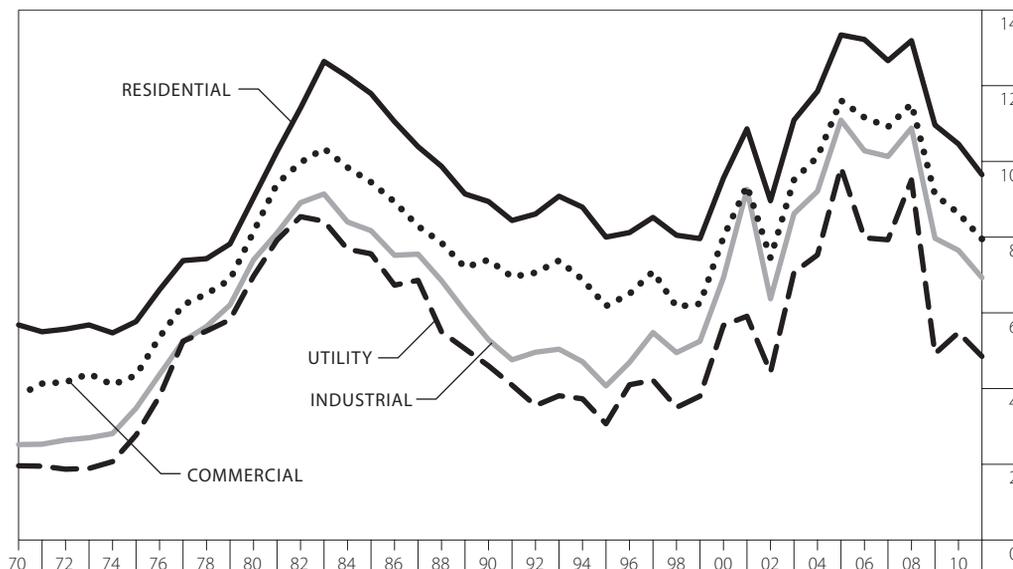
Plant	Consumption Thousand Tons	Average Btu Per Pound	Average Cents Per Million Btu	Average Dollars Per Ton	Average Percent Sulfur ^a
Dairyland Power Cooperative	1,854	8,697	271.6	47.24	0.57%
Alma - Madgett	1,311	8,714	263.2	45.87	0.53%
Genoa 3	543	8,657	291.9	50.54	0.65%
Manitowoc Public Utilities	109	13,485	168.3	45.38	1.41%
Manitowoc	109	13,485	168.3	45.38	1.41%
Northern States Power Co.	37	8,432	304.7	51.39	0.20%
Bay Front	37	8,432	304.7	51.39	0.20%
Wisconsin Electric Power Co.	10,254	9,407	264.0	49.67	0.52%
Elm Road	1,436	13,006	329.6	85.74	0.02%
Oak Creek	2,919	8,741	259.4	45.35	0.21%
Pleasant Prairie	4,089	8,353	206.9	34.56	0.32%
Presque Isle	1,402	9,519	256.3	48.80	0.26%
Valley	408	11,687	462.1	108.01	0.46%
Wisconsin Power and Light Co.	7,588	8,572	209.4	35.89	0.30%
Columbia	4,361	8,480	176.1	29.86	0.31%
Edgewater	2,658	8,483	253.1	42.94	0.29%
Nelson Dewey	569	9,690	254.1	49.24	0.33%
Wisconsin Public Service Corp.	3,966	8,659	276.5	47.88	0.27%
Pulliam	578	8,389	290.1	48.67	0.33%
Weston	3,388	8,705	274.3	47.75	0.26%
Wisconsin	23,807	8,978	249.4	44.78	0.42%
United States	688,436	9,897	240.7	47.65	1.20%

^a Percent by weight.

Source: U.S. Department of Energy, EIA, *Electric Power Monthly*, [DOE/EIA-0226(2010/03)] (March 2010), Tables 2.5 and 4.2, http://www.eia.doe.gov/cneaf/electricity/epm/epm_sum.html; Annual reports of Wisconsin electric generating utilities (2009), <http://psc.wi.gov/apps/annreport/default.aspx>; Dairyland Power Cooperative, Rural Utility Service (RUS) report for 2011 (April 2012).

Wisconsin Natural Gas Prices, by Economic Sector

1970-2011 DOLLARS PER MILLION BTU (2011 DOLLARS)



IN 2011
NATURAL GAS
PRICES
DECREASED IN
ALL
SECTORS

In 2011, natural gas prices decreased in all sectors. On average, the price decreased 6.9 percent.

1970-2011 DOLLARS PER MILLION BTU

Year	Current Dollars					2011 Dollars				
	Residential	Commercial	Industrial	Utility	Average	Residential	Commercial	Industrial	Utility	Average
1970	1.22	0.82	0.54	0.42	0.79	5.68	3.82	2.52	1.96	3.68
1975	1.71	1.29	1.03	0.82	1.30	5.77	4.35	3.48	2.77	4.39
1980	3.81	3.43	3.12	2.94	3.43	9.04	8.14	7.40	6.97	8.14
1985	6.41	5.14	4.44	4.11	5.37	11.79	9.45	8.17	7.56	9.88
1990	5.70	4.72	3.37	2.93	4.55	8.94	7.40	5.29	4.60	7.14
1995	5.76	4.45	2.93	2.21	4.30	8.00	6.18	4.07	3.07	5.97
2000	7.48	6.26	5.42	4.44	6.27	9.56	8.00	6.93	5.67	8.01
2001	8.69	7.49	7.41	4.73	7.71	10.86	9.36	9.26	5.91	9.63
2002	7.29	6.06	5.18	3.60	6.07	8.96	7.45	6.37	4.43	7.46
2003	9.21	7.90	7.16	5.87	8.00	11.09	9.51	8.62	7.07	9.63
2004	10.12	8.64	7.86	6.43	8.76	11.85	10.12	9.21	7.53	10.26
2005	11.77	10.24	9.78	8.68	10.37	13.34	11.61	11.09	9.84	11.76
2006	12.04	10.16	9.36	7.27	10.19	13.22	11.16	10.28	7.98	11.19
2007	11.86	10.22	9.49	7.43	10.17	12.66	10.91	10.13	7.93	10.85
2008	12.63	11.03	10.42	9.11	11.22	13.19	11.52	10.88	9.51	11.71
2009 ^r	10.61	8.83	7.71	4.76	8.69	10.96	9.12	7.97	4.92	8.98
2010	10.24	8.45	7.49	5.37	8.40	10.46	8.63	7.65	5.48	8.58
2011 ^p	9.65	7.95	6.93	4.85	7.82	9.65	7.95	6.93	4.85	7.82

^p Preliminary estimates.

^r Revised.

Source: Sector-specific pages in this chapter of this publication

Wisconsin Natural Gas Prices, by Public Service Commission of Wisconsin Sector

AVERAGE
PRICE OF
NATURAL GAS
6.7%

The prices of utility gas for all customer classes decreased in 2011. The average price of natural gas in 2011 decreased by 6.7 percent from 2010. Prices for commercial and industrial gas do not include the price of transport gas but represent the cost of gas purchased directly from the utility.

1970-2011 DOLLARS PER MILLION BTU

Year	Residential		Commercial and Industrial			Average
	General	Space Heating	Firm	Interruptible	Space Heating	
1970	1.55	1.22	0.73	0.49	0.92	0.81
1975	2.13	1.71	1.16	1.00	1.40	1.31
1980	4.34	3.81	3.22	3.07	3.49	3.44
1985	7.53	6.41	4.98	4.23	5.28	5.36
1990	6.78	5.70	4.28	3.00	4.49	4.85
1995	7.01	5.76	4.14	2.47	4.63	4.72
1996	7.00	5.96	4.26	3.30	4.75	5.08
1997	7.47	6.36	4.68	3.63	5.17	5.56
1998	7.48	6.08	4.16	3.15	4.74	5.25
1999	7.61	6.10	4.93	2.84	4.71	5.33
2000	8.86	7.48	7.32	4.63	6.05	6.78
2001	10.01	8.69	7.11	5.17	7.27	7.86
2002	8.79	7.29	6.19	3.91	5.92	6.50
2003	10.09	9.14	8.00	5.59	7.75	8.37
2004	11.20	10.03	8.80	6.94	8.56	9.27
2005	13.34	11.77	11.24	8.92	10.18	10.83
2006	13.71	12.04	10.44	8.17	10.09	10.97
2007	13.57	11.86	9.64	7.96	10.12	10.86
2008	14.35	12.63	10.69	9.27	10.95	11.76
2009	11.94	10.55	7.90	5.87	8.78	9.64
2010	11.85	10.20	7.98	5.69	8.32	9.24
2011^p	11.07	9.52	7.61	5.47	7.70	8.62

^p Preliminary estimates.

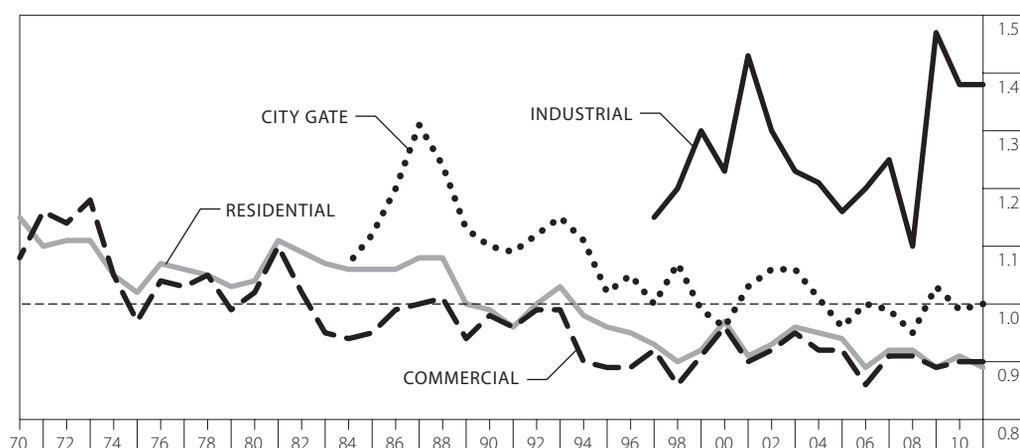
Source: Public Service Commission of Wisconsin, Accounts and Finance Division, *Statistics of Wisconsin Public Utilities*, Bulletin #8 (1971-1993), and from the PSC-AF 2, Docket 05-GF-159 (1994-2011).

Wisconsin Natural Gas Prices Relative to United States Natural Gas Prices, by Sector

The price of natural gas in Wisconsin is lower than the U.S. average price in the Residential and Commercial sectors, but it was 37.96 percent higher than the U.S. average in the Industrial sector in 2011.

The table shows the Wisconsin and United States prices by sector, while the graph shows the relationship (ratio) between these prices (Wisconsin:US). A value above 1 means that the WI price is more than the U.S. average price, and value below 1 means that the WI price is less than the U.S. average price. A value of 1 means that the WI price is equal to the national average price.

1970-2011 RATIO OF WI TO U.S. NATURAL GAS PRICES



1970-2011 WI AND U.S. NATURAL GAS PRICES (DOLLARS PER THOUSAND CUBIC FEET)

Year	WI Natural Gas Price (Dollars Per 1000 Cubic Feet)				U.S. Natural Gas Price (Dollars Per 1000 Cubic Feet)			
	City Gate	Residential	Commercial	Industrial	City Gate	Residential	Commercial	Industrial
1970		1.25	0.83			1.09	0.77	0.37
1975		1.75	1.31			1.71	1.35	0.96
1980		3.83	3.46			3.68	3.39	2.56
1985	4.19	6.47	5.20		3.75	6.12	5.50	3.95
1990	3.34	5.74	4.75		3.03	5.80	4.83	2.93
1995	2.83	5.82	4.50		2.78	6.06	5.05	2.71
2000	4.42	7.55	6.32	5.47	4.62	7.76	6.59	4.45
2005	8.35	11.93	10.38	9.91	8.67	12.70	11.34	8.56
2006	8.57	12.17	10.27	9.46	8.61	13.73	12.00	7.87
2007	8.04	12.02	10.36	9.62	8.16	13.08	11.34	7.68
2008	8.71	12.81	11.18	10.57	9.18	13.89	12.23	9.65
2009	6.70	10.76	8.95	7.82	6.48	12.14	10.06	5.33
2010	6.14	10.34	8.53	7.56	6.18	11.39	9.47	5.49
2011	5.65	9.77	8.03	7.05	5.63	11.03	8.92	5.11

The City Gate is the point where the natural gas pipeline connects with the utility, and represents the price paid by the utility. In 2011, it was the same as the national average. Wisconsin's industrial natural gas prices are 38 percent higher than the national average. Smaller sized industrial customers pay the industrial rate, while larger industrial customers purchase natural gas—as transport gas—directly from the natural gas pipeline companies with a pass-through charge from the utilities.

Commercial customers, such as schools, business and governmental facilities, pay 10 percent less than the national average, while Wisconsin's residential customers using natural gas for appliances and space heating pay 89 percent of the national average. The rates paid by customers vary from month-to-month and can be found on the State Energy Office website.

Source: Energy Information Administration, *Monthly Energy Review*, Table 6.8, (1970-2011), <http://www.eia.gov/totalenergy/data/monthly/#prices>; Energy Information Administration, Natural Gas Prices by state (1970-2011), http://www.eia.gov/dnav/ng/ng_pri_sum_dcu_SWL_a.htm

Wisconsin Electricity Prices, by Economic Sector

IN 2011
ELECTRICITY
INCREASED IN
ALL
SECTORS

Electricity prices increased across all sectors in 2011. The Public Service Commission of Wisconsin and the federal Department of Energy, Energy Information Administration (EIA) both report electricity prices for Wisconsin economic sectors. Because of differences in sector definitions, accounting methods and inclusion of cooperative utilities, their prices do not match.

1970-2011 CENTS PER kWh

Year	Public Service Commission of Wisconsin Sectors				Energy Information Administration ^c			
	Residential	Commercial & Industrial	Rural ^a	Average ^b	Residential	Commercial	Industrial	Average ^b
1970	2.13	1.69	2.41	1.89	2.19	2.39	1.35	1.91
1975	3.22	2.60	3.42	2.85	3.14	3.23	2.10	2.80
1980	4.80	3.91	4.80	4.24	4.91	4.94	3.23	4.31
1985	6.70	5.15	6.38	5.67	6.73	6.32	4.38	5.75
1990	6.55	4.68	6.29	5.27	6.65	5.82	3.99	5.38
1995	6.91	4.55	6.61	5.27	6.97	5.78	3.78	5.36
1996	6.81	4.43	6.40	5.15	6.88	5.68	3.66	5.25
1997	6.81	4.40	6.27	5.11	6.88	5.60	3.72	5.22
1998	7.16	4.61	6.42	5.35	7.17	5.87	3.86	5.44
1999	7.31	4.69	6.56	5.46	7.31	5.88	3.89	5.53
2000	7.55	4.83	6.84	5.65	7.53	6.03	4.04	5.71
2001	7.93	5.18	7.23	6.01	7.90	6.34	4.36	6.08
2002	8.19	5.34	7.59	6.26	8.18	6.54	4.43	6.28
2003	8.73	5.63	8.27	6.60	8.67	6.97	4.71	6.64
2004	9.11	5.84	8.73	6.81	9.07	7.24	4.93	6.88
2005	9.72	6.36	9.23	7.38	9.66	7.67	5.39	7.48
2006	10.57	7.01	10.22	8.08	10.51	8.37	5.85	8.13
2007	10.90	7.30	10.56	8.38	10.87	8.71	6.16	8.48
2008	11.56	7.67	10.90	8.84	11.51	9.28	6.51	9.00
2009 ^r	11.92	8.03	11.04	9.24	11.94	9.57	6.73	9.38
2010	12.67	8.30	12.10	9.66	12.65	9.98	6.85	9.78
2011^p	13.06	8.76	12.41	10.09	13.06	10.43	7.34	10.23

^a Rural, as listed by utilities.

^b Utilities' average revenue per kWh.

^c Historically, these data were from the Edison Electric Institute which began using U.S. Department of Energy electricity prices from the Energy Information Administration (EIA) in 1996.

^p Preliminary estimates.

^r Denotes year where numbers have been revised based on cited data sources.

Source: Public Service Commission of Wisconsin, Accounts and Finance Division, *Statistics of Wisconsin Public Utilities*, Bulletin #8 (1971-1994); PSC-AF 1, Docket 05-GF-159 (1994-2011); Edison Electric Institute, *Statistical Yearbook* (1971-1996); U.S. Department of Energy, Energy Information Administration, *Electric Sales and Revenue 1993-2000* [DOE/EIA-0540 (2000)] (November 2001), and *Electric Power Monthly*, Table 5.6.B, [DOE/EIA-0226 (2012/02)] (February 2012). http://www.eia.doe.gov/cneaf/electricity/epm/epm_sum.html

Average Utility Electricity and Natural Gas Prices, by Economic Sector, for Selected Midwestern States

2011 ELECTRICITY (CENTS PER kWh)

State	Average	Residential	Commercial	Industrial
Wisconsin	10.23	13.06	10.43	7.34
Illinois	9.01	11.81	8.64	6.46
Indiana	8.04	10.06	8.74	6.25
Iowa	7.59	10.50	7.90	5.21
Michigan	10.37	13.12	10.32	7.36
Minnesota	8.68	10.97	8.58	6.51
Ohio	9.05	11.44	9.60	6.21
U.S. Average	9.99	11.80	10.32	6.89

2011 NATURAL GAS (DOLLARS PER 1,000 CUBIC FEET)

State	City Gate ^a	Residential	Commercial	Industrial
Wisconsin	5.65	9.77	8.04	7.01
Illinois	5.09	8.60	8.12	6.69
Indiana	4.99	9.43	7.98	NA
Iowa	NA	9.54	7.58	5.67
Michigan	6.18	10.42	9.13	8.27
Minnesota	5.04	8.60	7.37	5.62
Ohio	NA	10.89	8.55	8.75
U.S. Average	5.62	10.80	8.86	5.02

WISCONSIN'S
AVERAGE
ELECTRICITY PRICE
WAS
2.4%
GREATER THAN THE
NATIONAL
AVERAGE
BUT
2nd
HIGHEST
IN THE MIDWEST

In 2011, Wisconsin's average electricity price was 2.4 percent greater than the national average but the second highest in the Midwest. Wisconsin's commercial and industrial electricity prices were higher than the national averages for the same sectors by 1.1 and 6.5 percent respectively.

Ohio and Michigan lead the Midwest with the highest natural gas prices across all three economic sectors.

^a City Gate is the point where a pipeline or distribution company delivers natural gas to the natural gas utility serving the city and the surrounding area.

NA – Not available.

Source: U.S. Department of Energy, EIA, *Electric Power Monthly*, Table 5.6.B [DOE/EIA-0226 (2010/03)] (March 2010) www.eia.doe.gov/cneaf/electricity/epm/epm_sum.html and *Natural Gas Monthly*, Tables 17, 18, 19 and 20 [DOE/EIA-0130 (2012/02)] (February 2012) http://www.eia.doe.gov/pub/oil_gas/natural_gas/data_publications/natural_gas_monthly/historical/2010/2010_02/ngm_2010_02.html

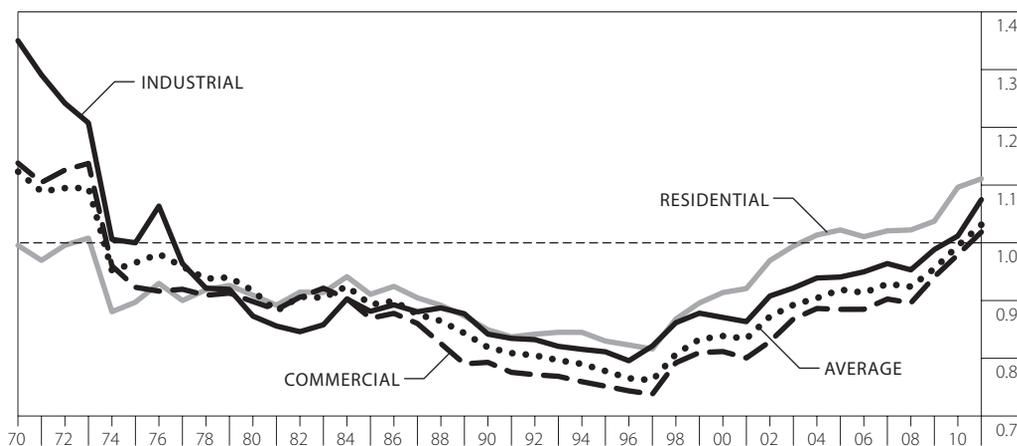
Wisconsin Electricity Prices Relative to United States Electricity Prices, by Sector

The price of electricity in Wisconsin continues to rise, and is now more than the U.S. average price for electricity in all sectors (Residential, Commercial, and Industrial). In 1997, Wisconsin's prices were the farthest below the U.S. average. Since then, electric prices for all sectors have moved closer to the U.S. average. In 2004, the price of electricity in the Residential sector exceeded the national average. In 2011, residential sector prices were 11.1 percent above the national residential sector price.

In 2011, Wisconsin Commercial sector prices exceeded the national commercial price by 1.9 percent; the Industrial sector paid 7.5 percent more than the national industrial average in 2011. Overall, on average, Wisconsin customers paid 3.1 percent more for electricity in 2011 than the national customer.

This graph shows the relationship (ratio) between Wisconsin electric prices and U.S. average electric prices, by sector. A value above 1 means that the WI price is more than the U.S. average price, and value below 1 means that the WI price is less than the U.S. average price. A value of 1 means that the WI price is equal to the national average price.

1970-2011 RATIO OF WI TO U.S. ELECTRICITY PRICES



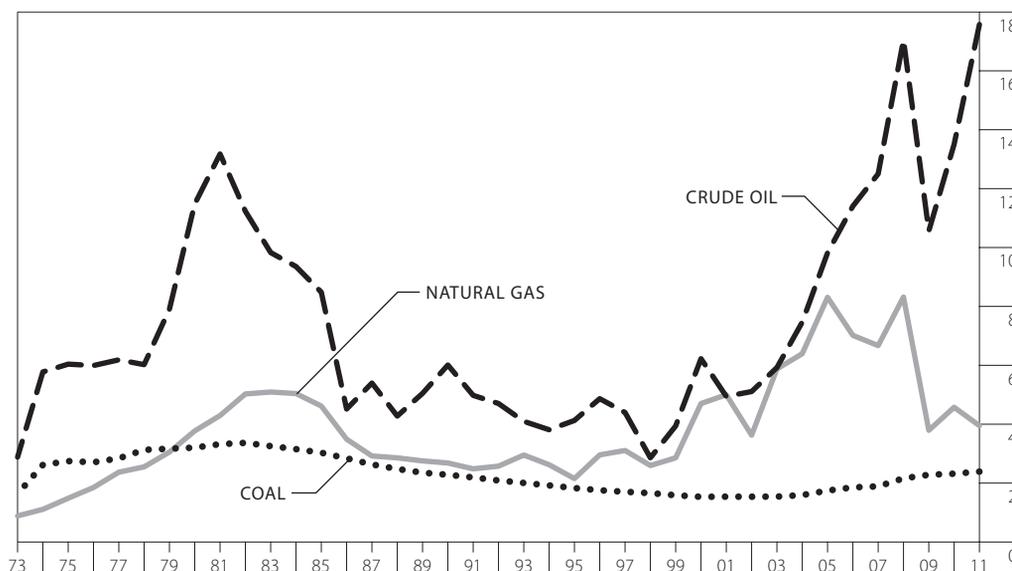
1970-2011 WI AND U.S. ELECTRICITY PRICES (CENTS PER kWh)

Year	WI Electricity Prices (Cents Per kWh)				U.S. Electricity Prices (Cents Per kWh)			
	Residential	Commercial	Industrial	Average (All Sectors)	Residential	Commercial	Industrial	Average (All Sectors)
1970	2.19	2.39	1.35	1.91	2.20	2.10	1.00	1.70
1975	3.14	3.23	2.10	2.80	3.50	3.50	2.10	2.90
1980	4.91	4.94	3.23	4.31	5.40	5.50	3.70	4.70
1985	6.73	6.32	4.38	5.75	7.39	7.27	4.97	6.44
1990	6.65	5.82	3.99	5.38	7.83	7.34	4.74	6.57
1995	6.97	5.78	3.78	5.36	8.40	7.69	4.66	6.89
2000	7.53	6.03	4.04	5.71	8.24	7.43	4.64	6.81
2005	9.66	7.67	5.39	7.48	9.45	8.67	5.73	8.14
2006	10.51	8.37	5.85	8.13	10.40	9.46	6.16	8.90
2007	10.87	8.71	6.16	8.48	10.65	9.65	6.39	9.13
2008	11.51	9.28	6.51	9.00	11.26	10.36	6.83	9.74
2009	11.94	9.57	6.73	9.38	11.51	10.17	6.81	9.82
2010	12.65	9.98	6.85	9.78	11.54	10.19	6.77	9.83
2011	13.02	10.42	7.33	10.21	11.72	10.23	6.82	9.90

Source: Edison Electric Institute, *Statistical Yearbook* (1971-1996); Energy Information Administration, *Average Retail Prices of Electricity*, Table 8.10 (1997-2011) www.eia.gov/totalenergy/data/monthly/#prices; Energy Information Administration, *Average Retail Prices of Electricity, by State* (1970-2011) www.eia.gov/electricity/data/browser/#/topic/.

U.S. Energy Prices

1973-2011 DOLLARS PER MILLION BTU (2010 DOLLARS)



1973-2011 DOLLARS PER MILLION BTU

Year	Current Dollars				2011 Dollars		
	Crude Oil Refiners Cost ^a \$/Barrel	Crude Oil Refiners Cost ^d \$/MMBtu	Natural Gas Wellhead ^b \$/MMBtu	Coal Utility Cost ^c \$/MMBtu	Crude Oil Refiners Cost \$/MMBtu	Natural Gas Wellhead \$/MMBtu	Coal Utility Cost \$/MMBtu
1973	4.15	0.72	0.22	0.41	2.88	0.89	1.63
1975	10.38	1.79	0.44	0.81	6.04	1.48	2.75
1980	28.07	4.84	1.59	1.35	11.48	3.77	3.20
1985	26.75	4.61	2.51	1.65	8.48	4.62	3.03
1990	22.22	3.83	1.71	1.46	6.01	2.68	2.28
1995	17.23	2.97	1.55	1.32	4.13	2.15	1.83
2000	28.26	4.87	3.68	1.20	6.23	4.70	1.53
2005	50.24	8.66	7.33	1.54	9.82	8.31	1.75
2010	76.69	13.22	4.48	2.27	13.50	4.58	2.32
2011 ^p	101.93	17.57	3.95	2.39	17.57	3.95	2.39

a Refiners cost of crude oil is the composite price for domestic and imported crude oil. Most of this crude oil is purchased under contract as opposed to the spot market.
b U.S. DOE natural gas price information is reported in dollars per 1,000 cubic feet. This table assumes: (1) 5.8 MMBtu per one barrel of crude oil, and (2) 1,000 cubic feet = 1 MMBtu.
c Includes cost of delivery to utilities.
d Assumes 5.8 MMBtu/Barrel.
p Preliminary estimates.

Source: U.S. Department of Energy, Energy Information Administration, *Monthly Energy Review* Tables 9.1, 9.10 and 9.11 [DOE/EIA-0035(2012/05)] (May 2012); <http://www.eia.gov/totalenergy/data/monthly/>

REAL COST IN 2011 DOLLARS

CRUDE OIL
30.1%
COAL
3.5%

REAL COST IN 2011 DOLLARS

NATURAL GAS
13.7%

In 2011, the real cost (2011 dollars) of crude oil increased 30.1 percent and decreased 13.7 percent for natural gas. The cost of coal increased by 3.5 percent.

COST OF CRUDE OIL 182.3% SINCE 2000

Since 2000, the cost of crude oil has increased by 182.3 percent.

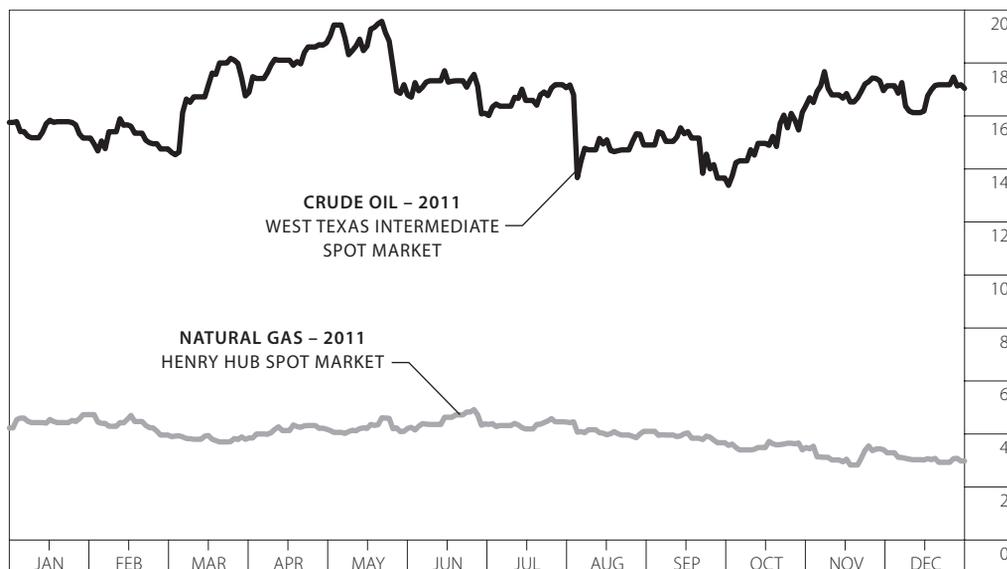
U.S. Spot Market Prices of Crude Oil & Natural Gas

WEST TEXAS
INTERMEDIATE
19.9%

HENRY HUB
8.5%

In 2011, the average West Texas Intermediate crude oil spot market price increased 19.9 percent, while the Henry Hub^b spot market price of natural gas decreased 8.5 percent.

2011 DOLLARS PER MILLION BTU (2011 DOLLARS)^a



2008-2011 DOLLARS PER MILLION BTU

Month	Crude Oil West Texas Intermediate				Natural Gas Henry Hub			
	2008	2009	2010	2011	2008	2009	2010	2011
Jan.	16.03	7.19	13.62	15.44	7.99	5.24	5.81	4.47
Feb.	16.44	6.74	13.21	15.53	8.54	4.51	5.12	4.11
Mar.	18.18	8.27	13.96	17.77	9.42	3.96	4.33	3.98
Apr.	19.41	8.56	14.52	18.89	10.18	3.49	4.03	4.20
May	21.62	10.18	12.88	17.53	11.27	3.83	4.10	4.34
Jun.	23.09	12.01	12.97	16.91	12.69	3.80	4.76	4.60
Jul.	23.01	11.06	13.12	16.77	11.09	3.38	4.61	4.37
Aug.	20.12	12.25	13.04	14.78	8.26	3.14	4.20	4.03
Sep.	17.91	11.97	12.95	14.89	7.63	2.99	3.93	3.93
Oct.	13.22	13.05	14.11	14.76	6.74	4.01	3.48	3.55
Nov.	9.90	13.48	14.49	16.75	6.68	3.70	3.75	3.18
Dec.	7.14	12.82	15.40	16.93	5.86	5.30	4.22	3.12
Average \$/MMBtu	17.17	10.63	13.69	16.41	8.86	3.95	4.36	3.99
Average \$/Barrel	99.60	61.66	79.39	95.18				

^a Graph is plotted with daily 2011 data.

^b Henry Hub is a natural gas pipeline hub in Louisiana.

Source: Oil Daily, electronically received data (2006-2008); WTI information also from http://tonto.eia.doe.gov/dnav/pet/pet_pri_spt_s1_d.htm (2011); Henry Hub data also from http://www.neo.ne.gov/statshtml/124_20081203.htm (2008); Bloomberg.com Energy Prices (2008-2011).

National Indices of Price Inflation

1970-2011 ANNUAL RATE OF INFLATION

Year	Gross Domestic Product ^{a,r}		Producer Price Index ^b		Personal Consumption Expenditures ^{c,f}		Consumer Price Index ^d	
	Index	% Change	Index	% Change	Index	% Change	Index	% Change
1970	24.34	5.3%	36.9	3.7%	23.67	4.7%	38.8	5.7%
1975	33.59	9.4%	58.4	9.2%	32.18	8.4%	53.8	9.1%
1980	47.79	9.1%	89.8	14.1%	46.64	10.7%	82.4	13.5%
1985	61.63	3.0%	103.2	-0.5%	59.88	3.3%	107.6	3.6%
1990	72.26	3.9%	116.3	3.7%	72.18	4.6%	130.7	5.4%
1995	81.61	2.1%	124.7	3.6%	82.08	2.2%	152.4	2.8%
1996	83.16	1.9%	127.7	2.4%	83.86	2.2%	156.9	3.0%
1997	84.63	1.8%	127.6	-0.1%	85.43	1.9%	160.5	2.3%
1998	85.58	1.1%	124.4	-2.5%	86.25	1.0%	163.0	1.6%
1999	86.84	1.5%	125.5	0.9%	87.64	1.6%	166.6	2.2%
2000	88.72	2.2%	132.7	5.7%	89.82	2.5%	172.2	3.4%
2001	90.73	2.3%	134.2	1.1%	91.53	1.9%	177.1	2.8%
2002	92.20	1.6%	131.1	-2.3%	92.78	1.4%	179.9	1.6%
2003	94.14	2.1%	138.1	5.3%	94.66	2.0%	184.0	2.3%
2004	96.79	2.8%	146.7	6.2%	97.12	2.6%	188.9	2.7%
2005	100.00	3.3%	157.4	7.3%	100.00	3.0%	195.3	3.4%
2006	103.23	3.2%	164.7	4.6%	102.72	2.7%	201.6	3.2%
2007	106.23	2.9%	172.6	4.8%	105.50	2.7%	207.3	2.8%
2008	108.58	2.2%	189.6	9.8%	108.94	3.3%	215.3	3.9%
2009	109.73	1.1%	172.9	-8.8%	109.17	0.2%	214.5	-0.4%
2010	110.99	1.1%	184.7	6.8%	111.11	1.8%	218.1	1.7%
2011 ^p	113.36	2.1%	201.0	8.8%	113.85	2.5%	224.9	3.1%

a Gross Domestic Product Implicit Price Deflator, 2005 = 100, used in other tables to deflate residential, commercial, industrial, motor fuel and electric utility prices.

b All commodities, 1982 = 100, BLS series ID: WPU00000000.

c Implicit Price Deflator, 2005 = 100.

d All items, all urban consumers, 1982-1984 = 100, BLS series ID: CUUR0000SA0.

p Preliminary estimates.

r Revised.

Source: U.S. Department of Commerce, Bureau of Economic Analysis, *Economic Indicators* (March 2010) <http://www.bea.gov/national/nipaweb/TableView.asp>, *Survey of Current Business* (March 2010); Bureau of Labor Statistics, (March 2010), <http://data.bls.gov/cgi-bin/surveymost?cu>.

PRODUCER
PRICE INDEX
8.8%

Price inflation indices are a measure of how much prices have changed from year to year. Each index is the ratio of prices in a given year to the base year. Each different index is normalized to 100 in different years. See footnotes for specific years. The percentage figure is the percent change from the previous year.

The broadest measure of price inflation is the Gross Domestic Product (GDP) price index. In 2011, the GDP index increased 2.1 percent compared to the 21 year average from 1990 to 2011 of 2.2 percent.