

Kentucky's Energy Landscape



Kentucky Energy & Environment Cabinet

Special Subcommittee on Energy

June 15, 2012



Today's Discussion

Energy Consumption and Expenditures

Transportation Fuels

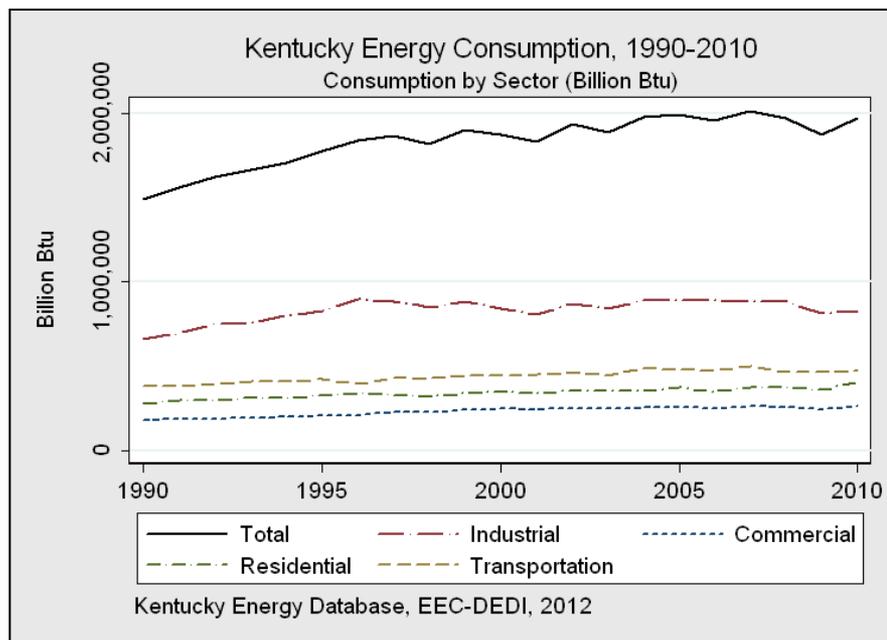
Electricity Price and Generation

Coal Production

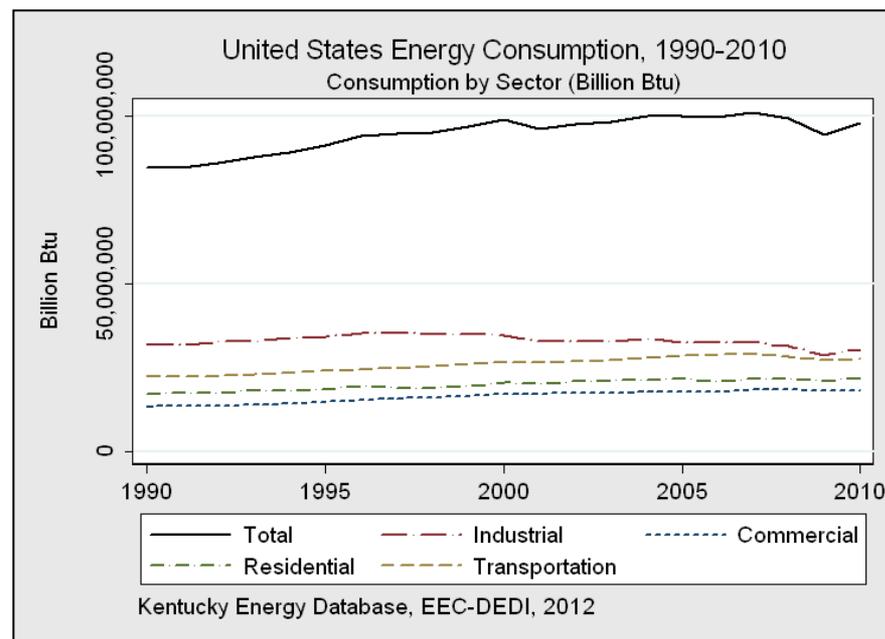
Energy Imports and Exports

*Kentucky and
United States Perspective*

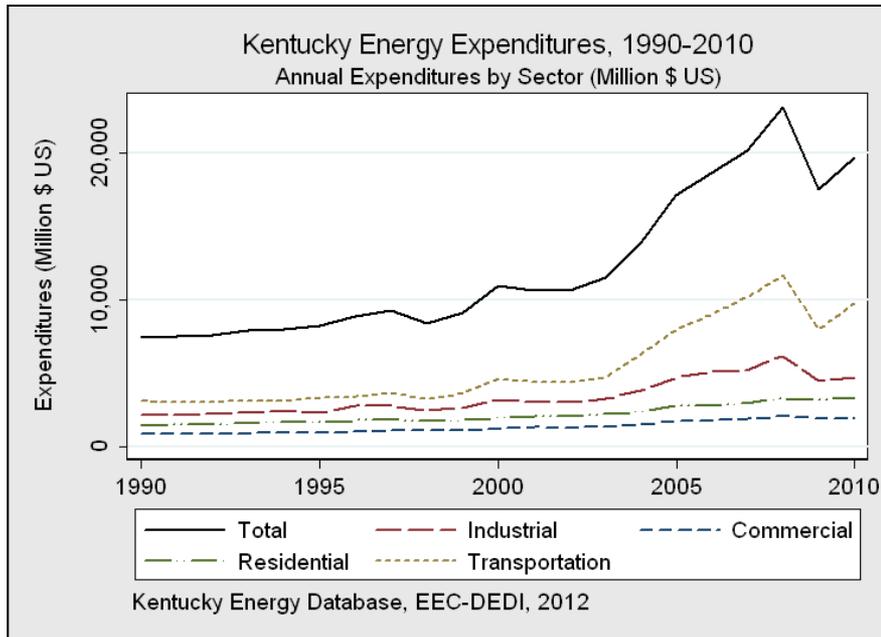
Energy Consumption



Energy consumption in Kentucky and nationally has been relatively flat since 2004.

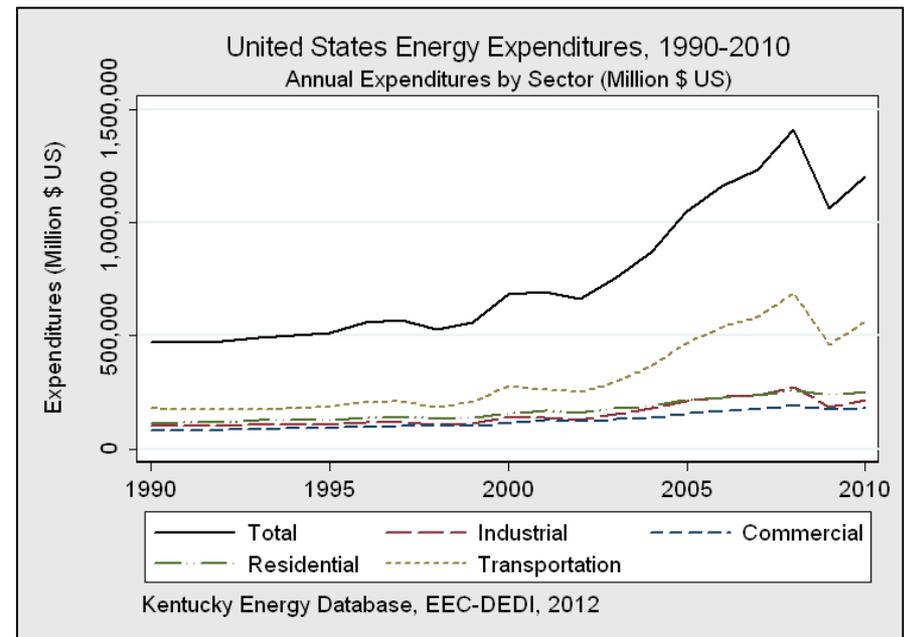


Energy Expenditures

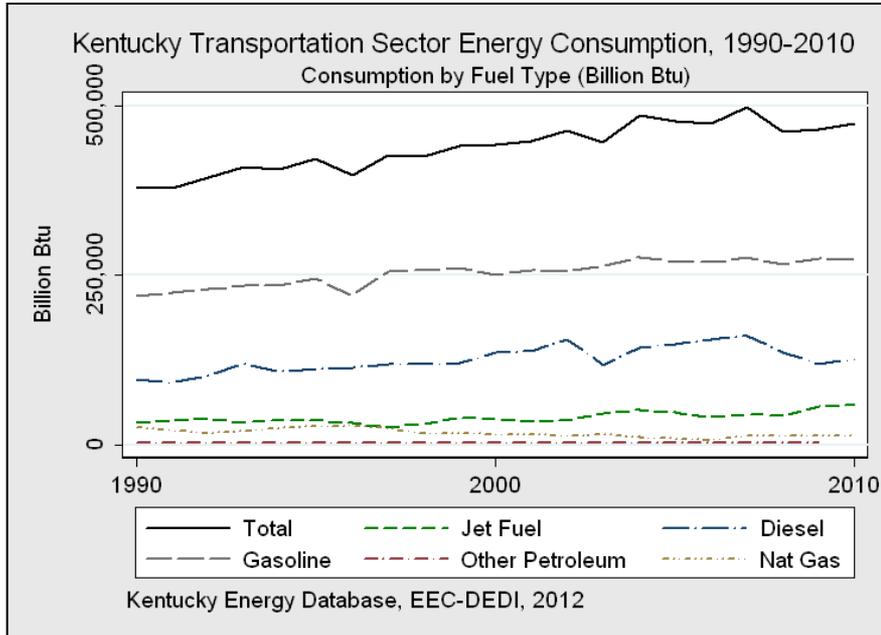


Energy expenditures in Kentucky have more than doubled since 2000 to \$20 billion annually in 2010.

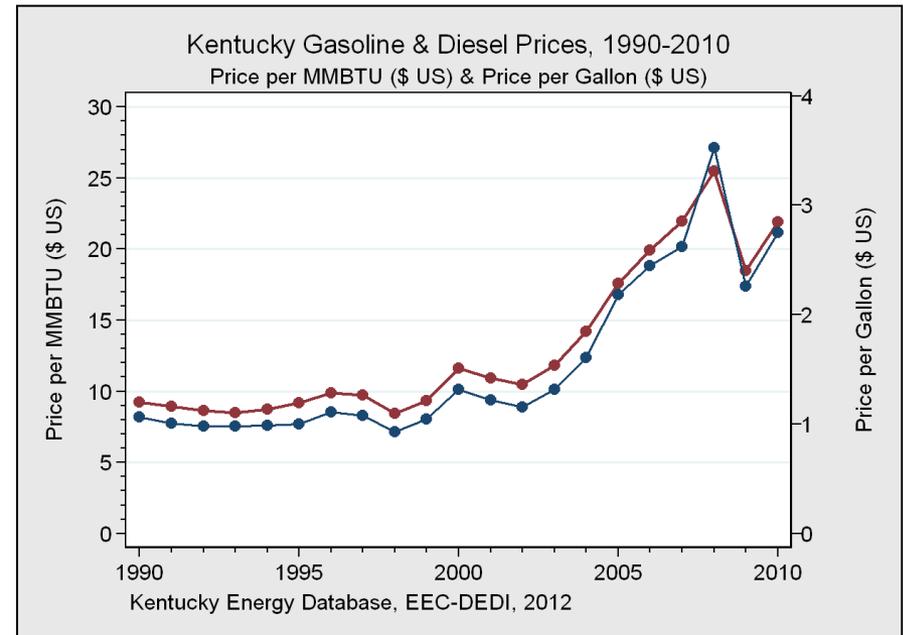
This increase is largely due to rising transportation fuel prices.



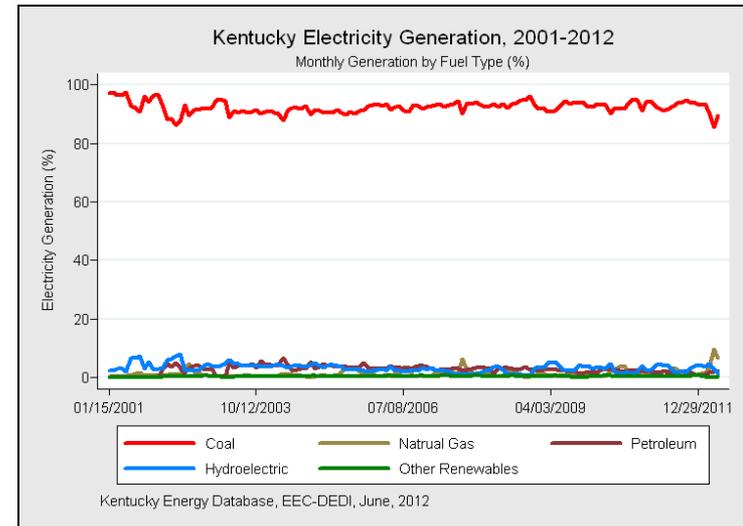
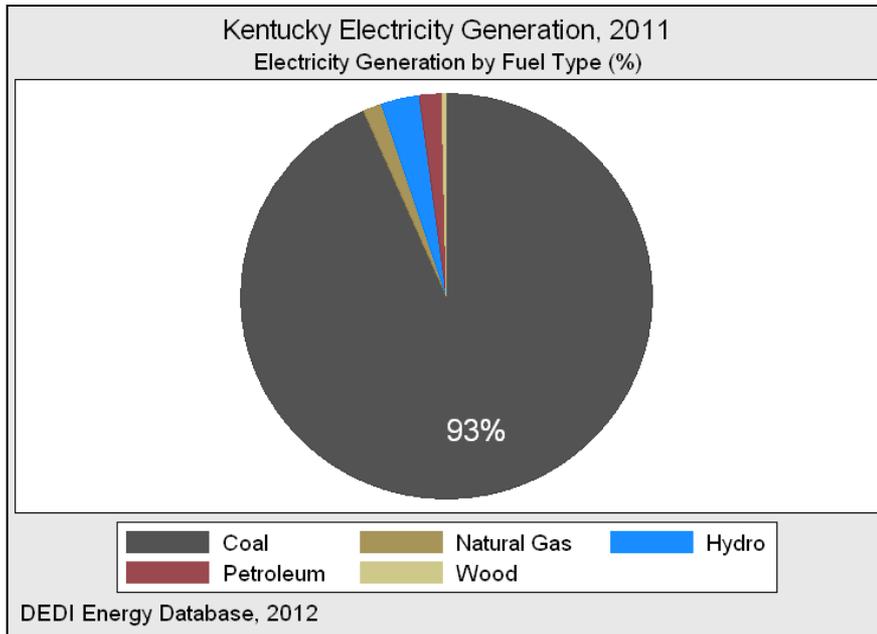
Transportation Fuels



Increases in total transportation energy expenditures were driven by price not increased consumption.

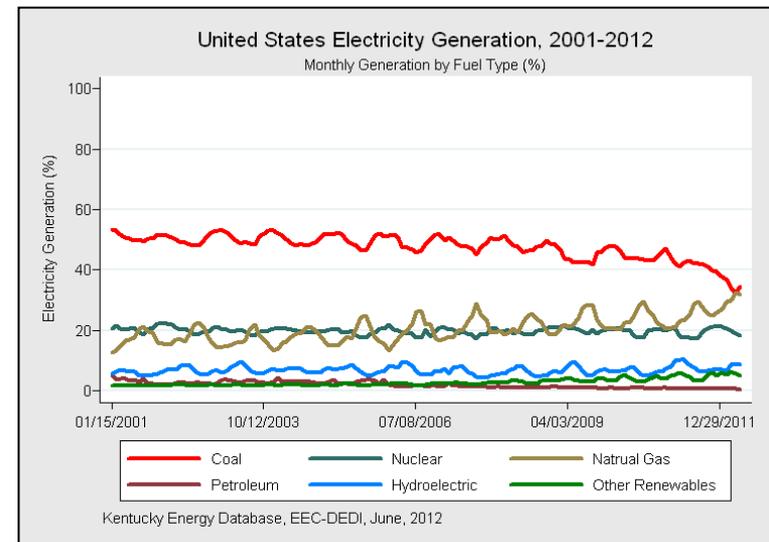


Electricity Generation

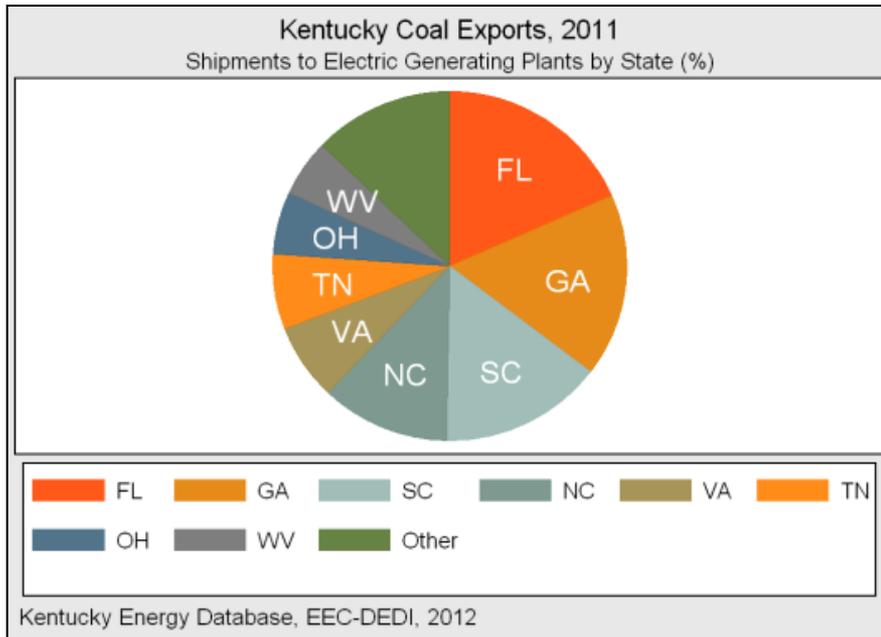


In March 2012, coal represented only 34% of national electricity generation.

Coal generation is being replaced by natural gas.

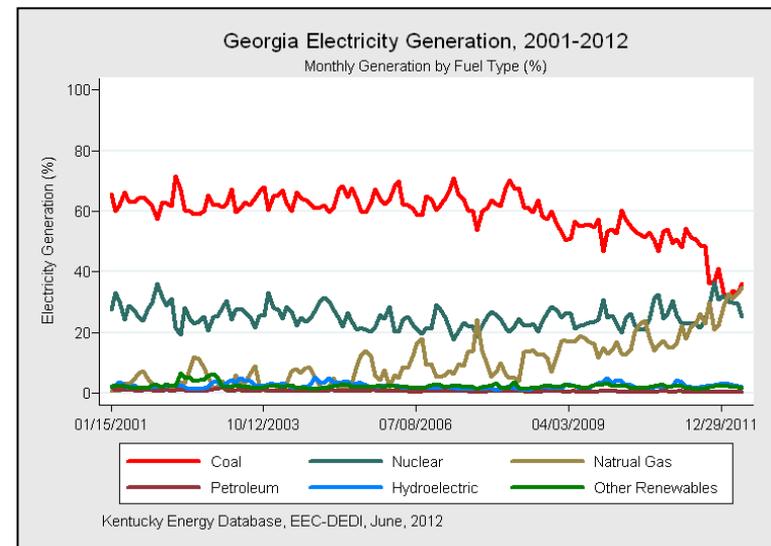
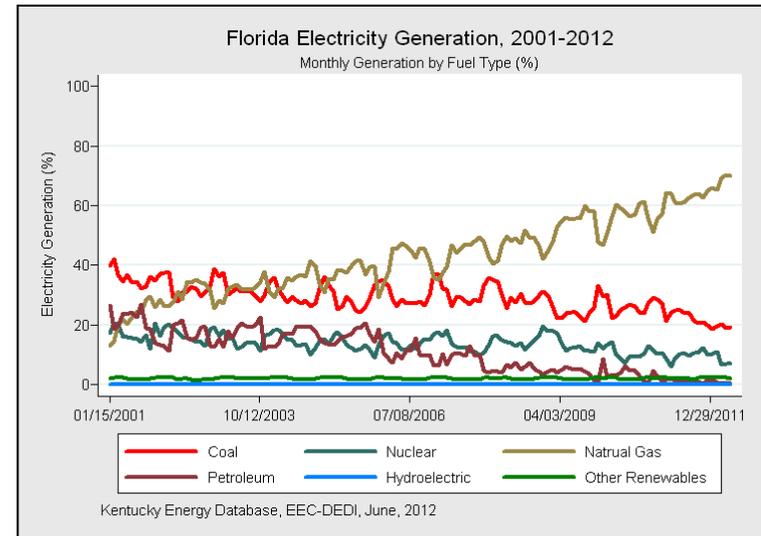


Electricity Generation

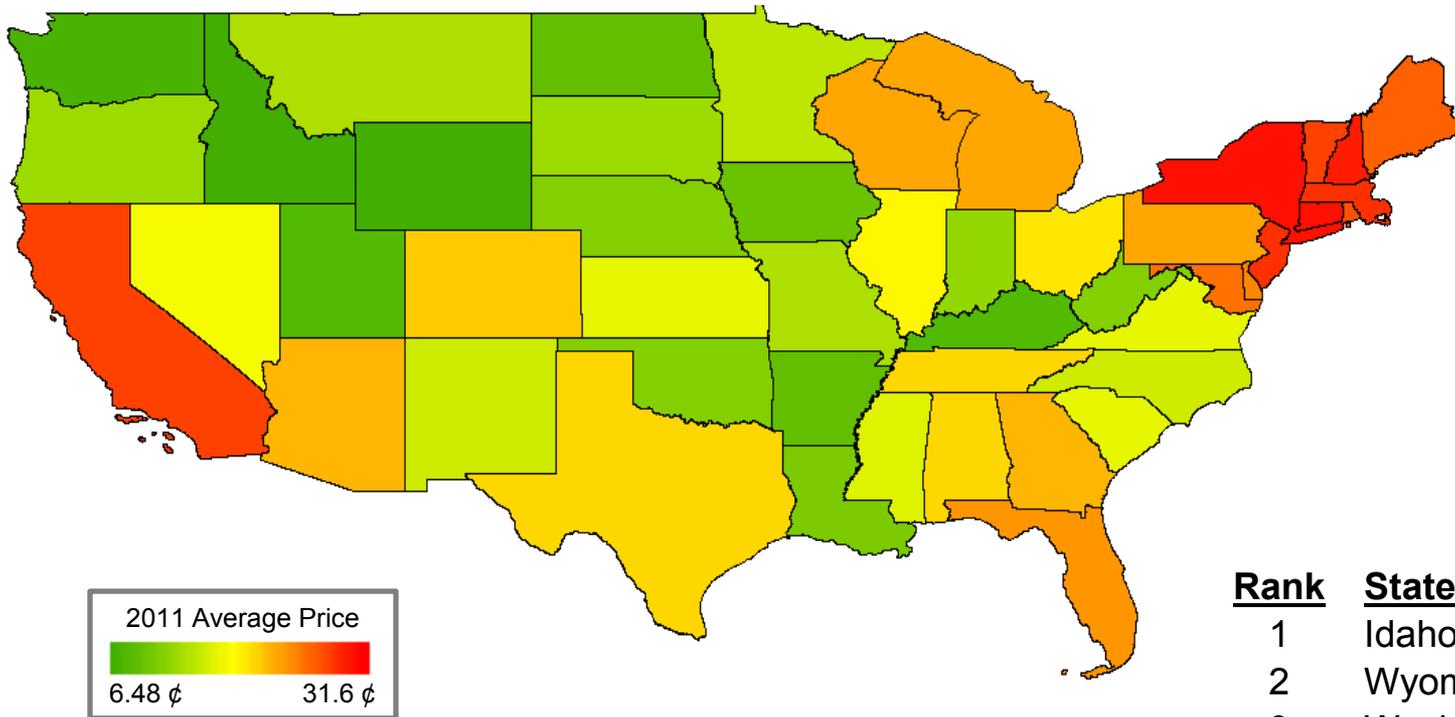


Kentucky's largest coal consumers are shifting to natural gas.

FL & GA are the top two consumers of Kentucky coal; other KY coal consuming states are trending in the same direction.



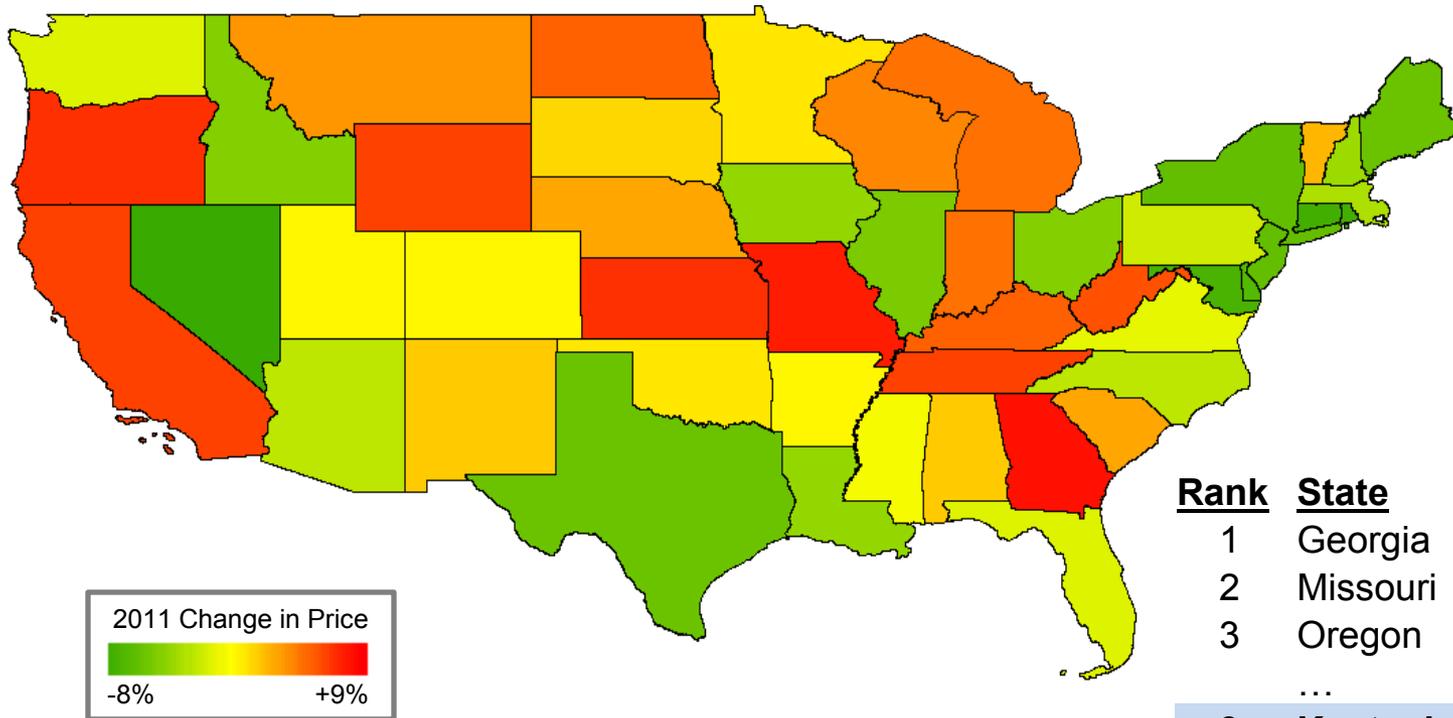
2011 Electricity Prices



<u>Rank</u>	<u>State</u>	<u>2011 Price</u>
1	Idaho	6.48¢
2	Wyoming	6.58¢
3	Washington	6.78¢
4	Kentucky	7.11¢
5	Utah	7.13¢
6	Arkansas	7.46¢
-	US Average	9.99¢

In 2011, Kentucky ranked fourth-lowest in overall average electricity price.

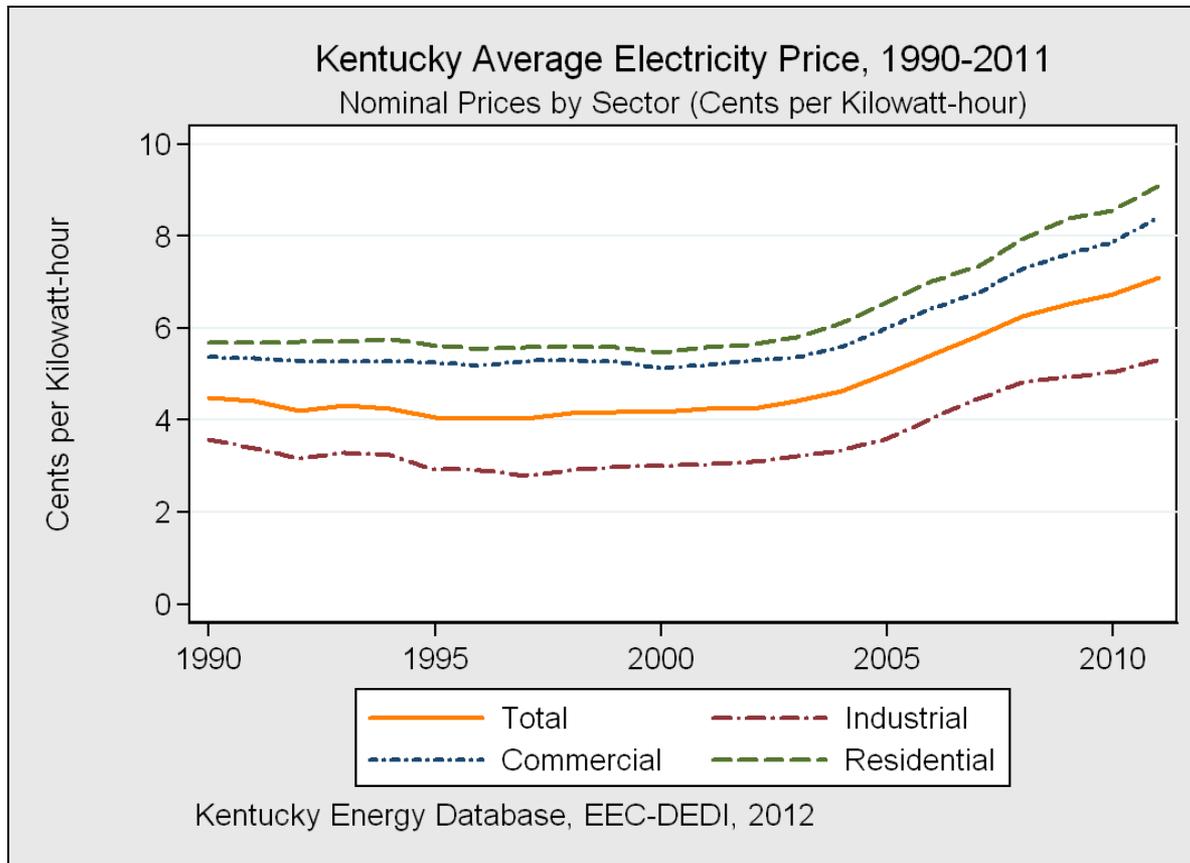
Change in Electricity Prices



<u>Rank</u>	<u>State</u>	<u>2011 Change</u>
1	Georgia	+8.8%
2	Missouri	+7.3%
3	Oregon	+6.9%
...
9	Kentucky	+5.6%
-	US Average	+1.1%
...
48	Connecticut	-6.0%
49	Rhode Island	-6.6%
50	Nevada	-8.0%

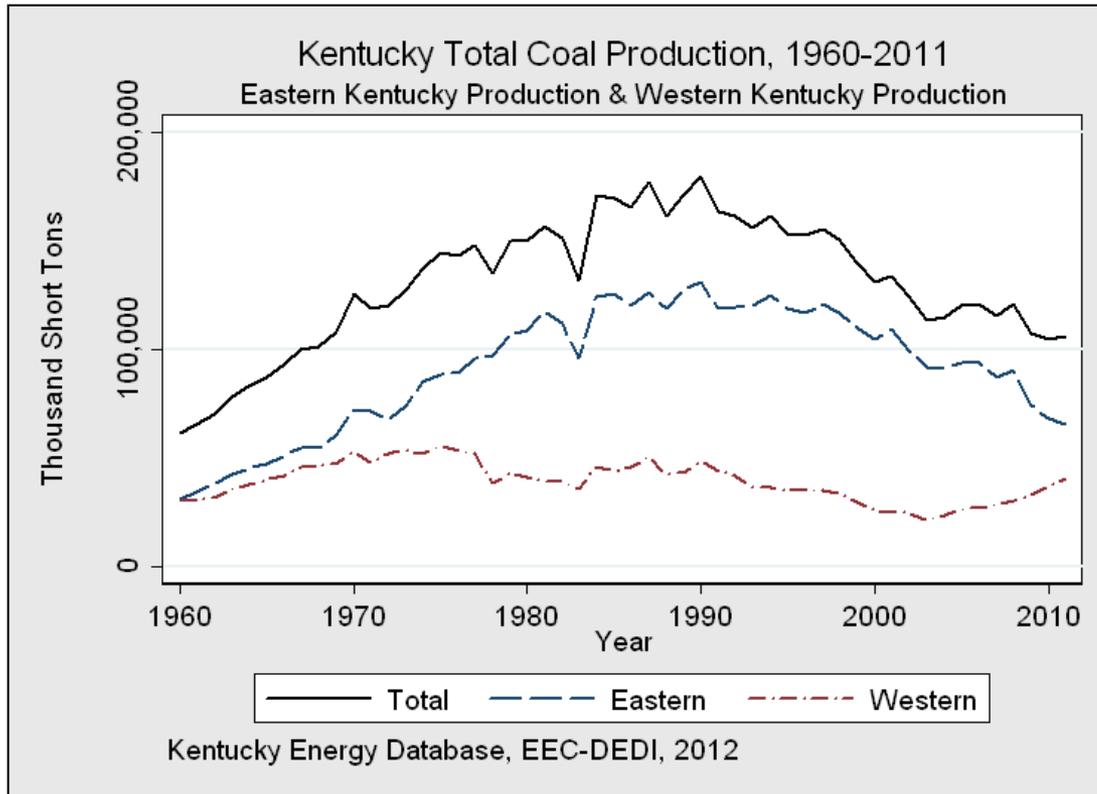
Kentucky's electricity prices are in the top ten fastest rising in the continental United States.

Change in Electricity Prices



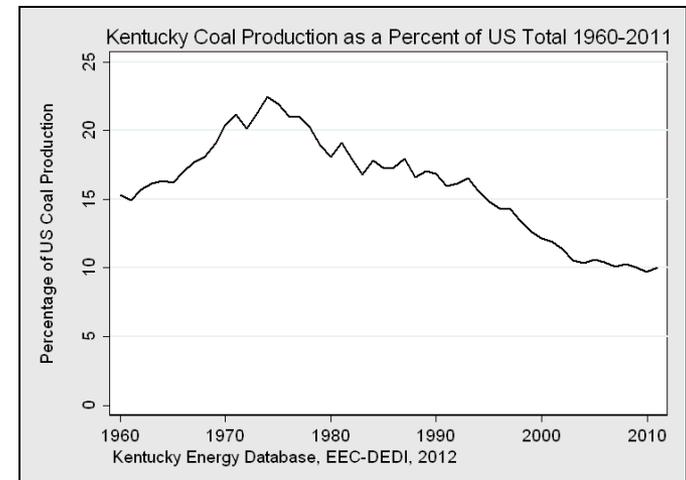
Over the last decade, Kentucky electricity prices have risen ~5% every year.

Coal Production

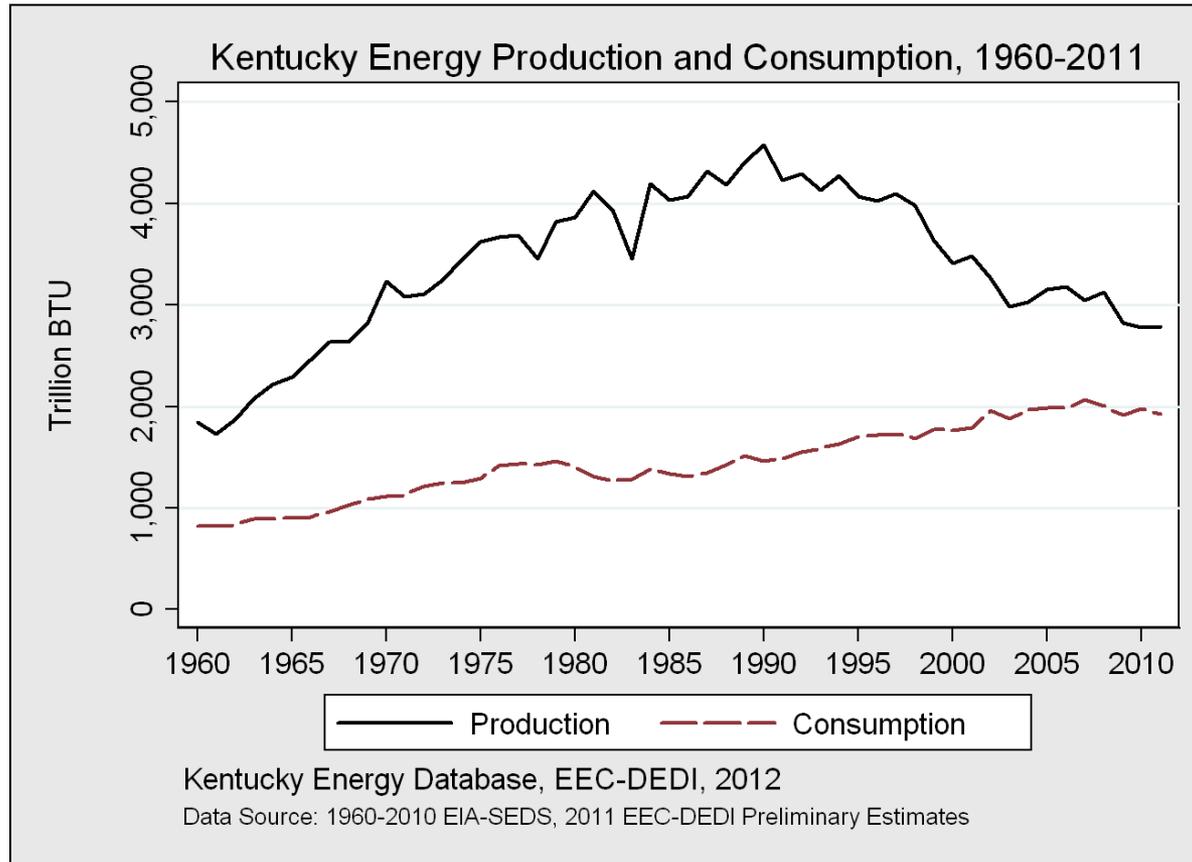


Kentucky production peaked in 1990.

Kentucky's coal production is declining, representing only 10% of U.S. production.



Energy Production vs. Consumption



Kentucky energy production is declining as consumption steadily increases.



What these trends are telling us...

Energy consumption has been relatively flat.

Transportation fuel prices have a significant impact on overall energy expenditures.

Natural gas is replacing coal for electricity generation.

Coal demand and production are falling.

Kentucky's net energy exports are declining.