



Memorandum

May 14, 2008

TO: House Ways and Means Committee
Attention: Matt Weidinger

FROM: Thomas Gabe
Specialist in Social Policy
Domestic Social Policy Division

SUBJECT: Effects of Increasing Energy and Food Costs on Poor and Low-Income Households' Living Standards

This memorandum is in response to your request concerning the effects of rising energy and food costs on poor and low-income households. The estimates presented in this memorandum are based on a Congressional Research Service (CRS) analysis of Bureau of Labor Statistics (BLS) Consumer Expenditure Survey (CEX) data for 2005, and energy, food, and overall consumer price inflation from 2005 to 2007, and forecasted inflation for 2008. You should be aware that portions of the analysis and results presented in this memorandum may be used in other CRS products, or tailored responses to Members of Congress, as there is considerable Congressional interest in the effects of food and energy price inflation on American families. Please don't hesitate to call me at 7-7357 if you have questions concerning this analysis.

Cautionary Note

As a cautionary note, it should be recognized that as poverty is currently measured in the U.S. based on income, rather than consumption, estimates of changes in food and energy prices on households' standards of living are not directly accounted for in official U.S. poverty statistics. *The estimates presented in this memorandum illustrate estimated changes in spending due to energy and price inflation in excess of core inflation (i.e., price inflation for all items excluding food and energy) for low-income households near the poverty line, and should not be construed as the effect of food and price inflation on official poverty.* The effect of price changes will only be captured by official U.S. poverty statistics to the extent to which family incomes ultimately fail to keep pace with overall inflation (holding all things constant), as poverty thresholds are indexed for inflation.

Introduction

The basic methodological approach taken in the analysis is to determine the additional spending burden to consumers that can be attributed to energy and food price inflation in

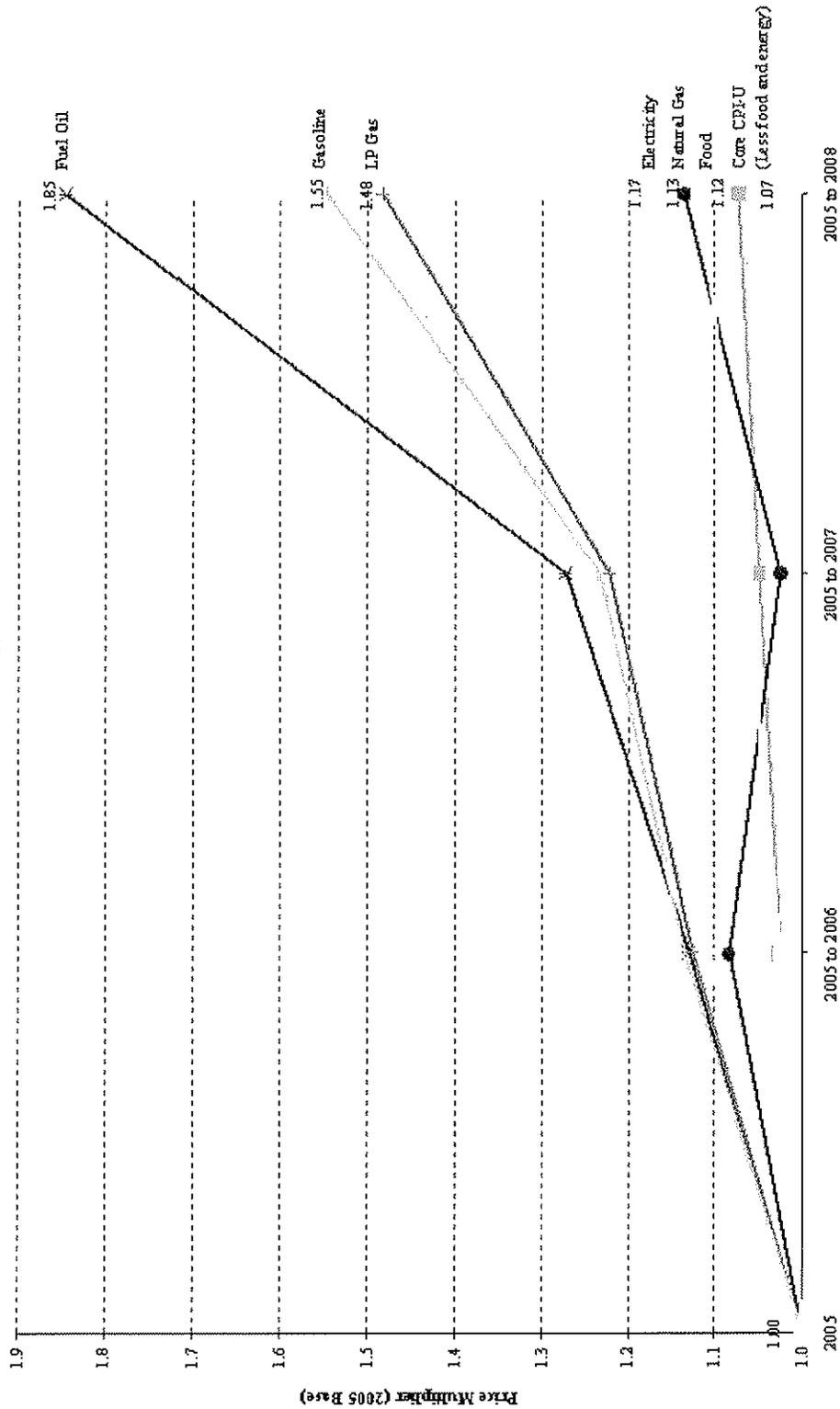
excess of core inflation (i.e, price inflation for all items excluding food and energy) in recent years (2005 to 2008). The analysis holds everything else constant by assuming that incomes rise with core inflation, and that there is no change in household consumer behavior in response to changing prices over the period. In reality, one would expect consumers to alter their behavior in response to rising prices. For example, with rising food prices, consumers might be expected to eat out less, and to shift their diets from more to less expensive items. With rising energy prices, consumers might be expected to drive less, turn down their thermostats in the winter, and turn them up in the summer. However, poor and low-income families might have less latitude to change their behavior in response to high prices than higher income families, as a greater share of their income and spending goes to necessities such as food and fuel, than that of higher income families, for whom discretionary items make up a greater share of their total spending. Actual effects of increased food and energy prices on U.S. households through 2008 won't be directly measurable until the spring of 2010, when CEX data for 2008 are first expected to become available. Absent those data, the approach taken here is to estimate relative impacts of increased food and energy prices on households whose income or spending places them near the poverty line.

Food and Energy Prices

Figure 1 depicts the change in prices for energy, food, and all other goods and services from 2005 through 2007 and 2008 (projected). Cumulative price changes over the period are normalized to 2005, which has a base value of 1.0. In addition to changes in energy (residential electricity, fuel oil, residential natural gas, propane (liquid petroleum, or LP gas), gasoline (retail, all grades including taxes)), and food prices, changes in core price inflation for all goods and services other than food and energy (CPI-U-Core) is shown. Core inflation is arrived at by factoring out direct food and energy components, which tend to be subject to volatile price shocks; core inflation is often used to measure underlying long-term inflation trends in the economy. Ultimately, long-term changes in energy prices may feed back to affect the prices of other goods and services, which will be captured in the core CPI.

Figure 1 shows, for example, that fuel oil prices are forecasted to be 85% higher in 2008 than in 2005 – nearly twelve times that of core inflation (7.2%). Gasoline prices are forecasted to increase by 55% in 2008 over their 2005 base. Residential electricity prices are forecasted to be 17% higher in 2008 than in 2005, and natural gas, 13% higher. Food prices are forecasted to be nearly 12% higher in 2008, than in 2005. Detailed price information is shown in **Table 1**.

Figure 1. Change in Prices for Food, Energy, and All Other Goods and Services
2005 to 2008



Source: Figure prepared by the Congressional Research Service. Energy price data from the U.S. Department of Energy, U.S. Energy Information Administration, issued May 6, 2008. Food price and Core CPI-U data from the U.S. Bureau of Labor Statistics and U.S. Department of Agriculture, Economic Research Service (food price forecast for 2008, issued April 25, 2008). Core CPI-U forecast based on Congressional Budget Office Economic Projections, released February 15, 2008.

Table 1. Food and Energy Prices for 2005 through 2007 and Forecasted Prices for 2008

	Price Indices			
	2005	2006	2007	2008
CPI - U	195.29	201.59	207.34	213.15
CPI-U-Core (Less Food and Energy)	200.89	205.92	210.73	215.37
Electricity (Residential) (cents per kilowatt hour)	9.40	10.40	10.60	11.00
Fuel Oil (cents per gallon)	162	183	206	299
Natural Gas (dollars per 1,000 cubic feet)	12.70	13.75	13.00	14.40
LP Gas (cents per gallon)	176	198	215	261
Gasoline (All Grades, After Taxes) (cents per gallon)	231	262	285	357
Food CPI-U	190.7	195.2	202.92	213.06
Food at home (CPI-U)	189.8	193.1	201.25	211.31
Food away from home (CPI-U)	193.4	199.4	206.66	215.96
	Annual Inflation Rate			
	2005 to 2006	2006 to 2007	2007 to 2008	
CPI - U	3.2%	2.9%	2.8%	
CPI-U-Core (Less Food and Energy)	2.5%	2.3%	2.2%	
Electricity (Residential) (cents per kilowatt hour)	10.6%	1.9%	3.8%	
Fuel Oil (cents per gallon)	13.0%	12.6%	45.1%	
Natural Gas (dollars per 1,000 cubic feet)	8.3%	-5.5%	10.8%	
LP Gas (cents per gallon)	12.5%	8.6%	21.4%	
Gasoline (All Grades, After Taxes) (cents per gallon)	13.4%	8.8%	25.3%	
Food CPI-U	2.4%	4.0%	5.0%	
Food at home (CPI-U)	1.7%	4.2%	5.0%	
Food away from home (CPI-U)	3.1%	3.6%	4.5%	
	Cumulative Price Changes -- Base Year 2005			
	2005	2005 to 2006	2005 to 2007	2005 to 2008
CPI - U	1.0000	1.0323	1.0617	1.0914
CPI-U-Core (Less Food and Energy)	1.0000	1.0250	1.0490	1.0720
Electricity (Residential) (cents per kilowatt hour)	1.0000	1.1064	1.1277	1.1702
Fuel Oil (cents per gallon)	1.0000	1.1296	1.2716	1.8457
Natural Gas (dollars per 1,000 cubic feet)	1.0000	1.0827	1.0236	1.1339
LP Gas (cents per gallon)	1.0000	1.1250	1.2216	1.4830
Gasoline (All Grades, After Taxes) (cents per gallon)	1.0000	1.1342	1.2338	1.5455
Food CPI-U	1.0000	1.0236	1.0641	1.1173
Food at home (CPI-U)	1.0000	1.0174	1.0603	1.1133
Food away from home (CPI-U)	1.0000	1.0310	1.0686	1.1166

Table 1. Food and Energy Prices for 2005 through 2007 and Forecasted Prices for 2008

	Prices in Excess of Core Inflation – Cumulative Price Changes – Base Year 2005			
	2005	2005 to 2006	2005 to 2007	2005 to 2008
Electricity (Residential) (cents per kilowatt hour)	1.0000	1.0814	1.0787	1.0982
Fuel Oil (cents per gallon)	1.0000	1.1046	1.2226	1.7736
Natural Gas (dollars per 1,000 cubic feet)	1.0000	1.0577	0.9747	1.0618
LP Gas (cents per gallon)	1.0000	1.1000	1.1726	1.4109
Gasoline (All Grades, After Taxes) (cents per gallon)	1.0000	1.1092	1.1848	1.4734
Food CPI-U	1.0000	0.9986	1.0151	1.0452
Food at home (CPI-U)	1.0000	0.9924	1.0113	1.0413
Food away from home (CPI-U)	1.0000	1.0060	1.0196	1.0446

Source: Table prepared by the Congressional Research Service (CRS). Energy price data from the U.S. Department of Energy, U.S. Energy Information Administration, issued May 6, 2008. Food price and Core CPI-U data from the U.S. Bureau of Labor Statistics and U.S. Department of Agriculture, Economic Research Service (food price forecast for 2008, issued April 25, 2008). Core CPI-U forecast based on Congressional Budget Office Economic Projections, released February 15, 2008.

Methodological Approach

As noted above, the basic approach taken in this analysis is to estimate the marginal effects of increased food and energy prices on poor and low-income consumer units. The estimates presented here are based on CRS analysis of BLS 2005 CEX data, which measures spending on various consumer goods and services by households. Component price changes (actual through 2007, projected 2008) for food (food purchased for consumption at home, food purchased away from home), home energy (electricity, natural gas, fuel oil, propane (liquid petroleum)), and gasoline (all grades, including taxes) were applied to the sample of approximately 35,000 consumer units on the CEX, representing nearly 117 million consumer units.¹ For purposes of this narrative, the term consumer units and households will be used interchangeably in this memorandum. Regional differences in actual and forecast price changes for food, electricity, natural gas, and gasoline were applied to households on the CEX; national price changes for fuel oil and LP Gas were applied, as regional variations in cost were not available. In applying actual and forecast price changes, only price changes in excess of core inflation were used. (See **Table 1**). The analysis thereby assumes that household incomes keep pace with underlying *core inflation* over the period, and that the added burden of increasing food and energy prices is measured by the degree to which those prices exceed core inflation. As noted earlier, no changes in consumer behavior are assumed. Consequently, the estimates depicted here likely reflect upper bound estimates of the marginal effects of food and energy price increases over the 2005 to 2008 period on household living standards.

¹ Consumer units on the CEX comprise 1) all members of a household who are related by blood, marriage, adoption, or other legal arrangements; 2) a person living alone or sharing a household with others, but who is financially independent; or 3) two or more persons living together who use their income to make joint expenditures.

Two measures are developed to estimate the marginal effects of food and energy price changes on household living standards (see **Table 2** and **Figure 2**):

- *Adjusted-Income Relative to Poverty Measure*: Estimates the effects of food and energy prices on household income by treating food and energy price increases in excess of core inflation as if those increases result in a loss of income. The change in adjusted-income relative to poverty is measured as the change in the number of households estimated as poor, on an adjusted-income basis, assuming food and energy prices were the same as core inflation, compared to actual and forecast food and energy price increases that exceed, or are forecast to exceed, core inflation.
- *Adjusted-Spending Relative to Poverty Measure*: Estimates the effects of food and energy prices relative to household spending, by treating food and energy price increases in excess of core inflation as if those increases result in an equivalent reduction in other spending. It measures the effect of increased food and energy prices as if those increases completely crowd out other household spending, making the household worse off, by consuming less of all other goods and services. The effect is measured by subtracting excess food and energy spending from total spending on all other goods, and comparing total spending to the households' poverty thresholds.

As we discussed, a third measure is developed which estimates household's *fuel burden*, where fuel spending is shown as a percent of total household income and alternately as a percentage of household spending on all goods and services. In the United Kingdom (UK) households are considered in "fuel poverty" if they spend 10% or more of their income on fuel. No such concept has been officially adopted in the United States.

For very low income households, aggregate household spending on the CEX tends to be significantly greater than aggregate income. To some extent, this phenomenon might incur in part due to households drawing on savings during certain periods (e.g., during a period of unemployment, or retirement) to maintain household expenditure levels. However, the CEX is generally thought to do a better job of collecting information about households' spending patterns than in collecting information about their sources and levels of income, and it is thought that income consequently tends to be under-reported on the survey.² For this reason, the marginal effects of expenditures on food and energy are shown both relative to a marginal change in income, as well as a change in spending, as defined by the first two measures described above.

² See for example, Bruce D. Meyer and James X. Sullivan, "Measuring the Well-Being of the Poor Using Income and Consumption." *Journal of Human Resources* 38 Supplement, 2003, pp.. 1180-1220.

The official U.S. poverty line in use today was developed in the early 1960s.³ It was developed by setting a minimal standard based on food consumption, derived from research that used data from the U.S. Department of Agriculture's (USDA) 1955 Household Food Consumption Survey. From that research, it was found that an average U.S. family spent one-third of its pre-tax income on food. A standard of food adequacy level was set by pricing out the USDA's Economy Food Plan, a bare-bones plan designed to provide a healthy diet for a temporary period when funds are low. Once priced, an overall poverty income level was set by multiplying the food plan by three, to correspond to the findings from the 1955 USDA Survey that an average family spent one-third of its pre-tax income on food, and the remaining two-thirds for everything else. Since originally adopted in 1969 as the official U.S. poverty measure, it has changed little, with the exception of being adjusted each year for overall price changes in the economy, as measured by Consumer Price Index for all Urban Consumers (CPI-U). As such, the poverty line reflects living standards that prevailed in the mid-1950s, and is often characterized as an "absolute" poverty measure, in that it is not been adjusted upwards as standards of living in the country have improved over the decades since it was first developed. The official poverty line has virtually little or no bearing today to the cost of a market basket of goods and services that might be deemed minimally adequate for households overall, nor for how that market basket might differ for families of varying circumstance. Nonetheless, the poverty line is still useful as one benchmark to assess the effects of the economy and policy on society's most vulnerable members.

Census Bureau poverty income thresholds vary by family size and composition. In 2007 (the latest available) the preliminary estimated annual Census poverty threshold for an individual under age 65, living alone, is \$10,787; for a family of two with a householder under age 65, \$13,955, and for a family of four, \$21,201. Families are considered poor if their corresponding incomes are below the specified thresholds.

In this analysis, Census poverty thresholds for families of varying size and composition for 2005 were merged on the 2005 CEX, according to characteristics of the consumer unit (age of householder and number of members in the unit). For purposes of determining a consumer unit's (household's) poverty status, their post-tax income, including the value of food stamps, was compared to the unit's corresponding poverty threshold. This measure of income poverty differs from the official measure, in that it is based on post-tax income, rather than pre-tax income under the official measure, and includes the cash value of any food stamps the household receives, whereas food stamps are not included in the official poverty measure. Additionally, an expenditure poverty level was also constructed, by comparing the consumer units' total spending to their corresponding poverty thresholds.

Noted earlier, it should be recognized that as poverty is currently measured in the U.S. based on income, rather than consumption, estimates of changes in food and energy prices on households standards of living are not directly accounted for in official U.S. poverty statistics. *The estimates presented in this memorandum illustrate estimated changes in spending due to energy and price inflation in excess of core inflation (i.e., price inflation for all items excluding food and energy) for low-income households near the poverty line, and*

³ For a history of the development of the official U.S. poverty measure, see: *The Development of the Orshansky Poverty Thresholds and Their Subsequent History as the Official U.S. Poverty Measure*, by Gordon Fisher. Available on the internet at: [<http://www.census.gov/hhes/www/povmeas/papcrs/orshansky.html>].

should not be construed as the effect of food and price inflation on official poverty. The effect of price changes will only be captured by official U.S. poverty statistics to the extent to which family incomes ultimately fail to keep pace with overall inflation (holding all things constant), as poverty thresholds are indexed for inflation.

Results – Estimated Effects of Rising Food and Energy Prices on Poor and Low-Income Households

Table 2 shows that of the nearly 117 million households represented by the 2005 Consumer Expenditure Survey, 14.7 million (12.6%) were estimated to have incomes below poverty in that year, and 12.2 million (10.4%) to have aggregate household expenditures below poverty. The table shows estimated effects on food and fuel prices on *adjusted-income* and *adjusted-spending* measures relative to poverty defined above. A summary of the number of households affected by relative price changes in food, energy (home energy, and gasoline), and food and energy combined is shown in **Figure 2**.

Table 2 shows that if household incomes only kept pace with core inflation, increases in food prices in excess of core inflation from 2005 to 2008 are analogous to a decrease in real income such that an estimated 216,000 households would have *adjusted-incomes* that fall below poverty, with all other things being held equal. The percent with *adjusted-incomes* below poverty is estimated to increase from 12.6% of households to 12.8% of households when the relative effect of higher food prices over the three-year period is factored in.

When viewed in terms of total spending relative to poverty, rather than income, increased food prices over the 2005 to 2008 period have the estimated effect of decreasing households' standard of living, such that the number of households with sub-poverty spending levels, based on the *adjusted-spending* measure, increases by an estimated 335,000, from 12.204 million (10.4% of households) to 12.538 million (10.7% of households).

The table shows, of the three major components – food, home energy, and gasoline – the increase in gasoline prices has the greatest estimated effect on household living standards for those who are near poverty. Based on changes in *adjusted-income* relative to poverty resulting from gasoline prices exceeding core inflation, an additional 720,000 households are estimated to have their standard of living fall below the poverty level; based on changes in *adjusted-spending relative* to poverty, 952,000 households are estimated to have their living standard fall below the poverty level.

When food, home energy, and gasoline price increases are taken together, the number of households estimated to see their living standards fall below the poverty level ranges from 1.2 million, based on a change in *adjusted-income*, to 1.6 million, based on a change in *adjusted-spending*. When measured on the basis of income relative to poverty, without accounting for increased prices, 12.6% of households are estimated to be poor. After factoring in the excess costs of food, home energy, and gasoline, the effect is as if an additional 1.2 million households had their standard of living fall below poverty, increasing the poverty rate from 12.6% to 13.6%, or a 7.7% increase.

When measured on the basis of total household spending relative to poverty, the effect of increased food, home energy, and gasoline prices reduces household living standards to the extent that an additional 1.6 million households are estimated to have *adjusted-spending* levels that would be below the poverty level, all other things being held constant. When

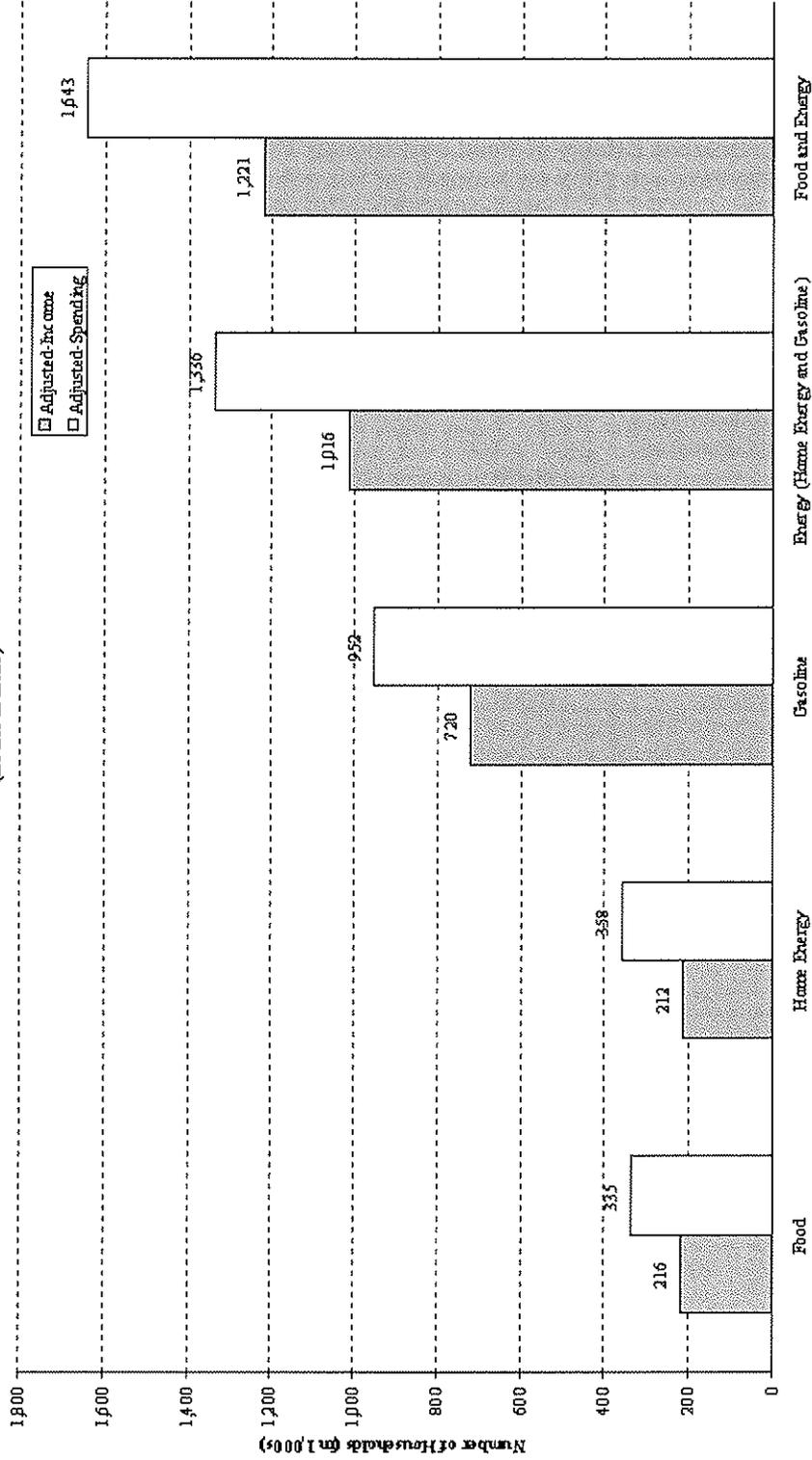
viewed on this basis, 10.4% of households would be considered poor based on household spending, before factoring in food, home energy, and gas price increases, but 11.8% would be considered poor after factoring in those prices – a 12.1% increase in the number of households with sub-poverty living standards resulting from increased food and energy prices.

**Table 2. Estimated Effects of Food and Energy Prices in Excess of Core Inflation from 2005 through 2008 on Number of Households with Relative Income or Spending Below Poverty
(Number of Household Units in 1,000's)**

	Relative Income below Poverty				Relative Spending below Poverty			
	Change in Number	Percent change	Percent of total units		Change in Number	Percent change	Percent of total units	
Number of households below poverty based on income or spending	14,741		12.6%		12,204		10.4%	
After excess costs above core inflation from:								
Food	14,957	216	1.5%	12.8%	12,538	335	2.7%	10.7%
Home Energy	14,953	212	1.4%	12.8%	12,561	358	2.9%	10.7%
Gasoline	15,461	720	4.8%	13.2%	13,156	952	7.6%	11.2%
Energy (Home Energy and Gasoline)	15,757	1,016	6.6%	13.5%	13,539	1,336	10.2%	11.6%
Food and Energy	15,962	1,221	7.7%	13.6%	13,846	1,643	12.1%	11.8%

Source: Congressional Research Service (CRS) estimates from analysis of U.S. Bureau of Labor Statistics 2005 Consumer Expenditure Survey and food and energy price inflation from 2005 through 2008 (forecasted).

Figure 2. Estimated Increase in Number of Households with Living Standards Below Poverty based on Adjusted-Income or Adjusted-Spending (Accounting for Food and Energy Price Increases in Excess of Core Inflation from 2005 through 2008) (in thousands)



Source: Figure prepared by the Congressional Research Service based on analysis of 2005 Consumer Expenditure Survey (CEY) data and food and energy price changes from 2005 through 2008 (forecasted).

Fuel Burden

Table 3 provides an alternative approach to estimating the effects of rising energy prices on households in terms of households' *fuel burden*, where fuel spending is calculated as a percentage of total household income and alternately as a percentage of household spending on all goods and services. As noted earlier, in the UK households are considered in "*fuel poverty*" if they spend 10% or more of their income on fuel. Applying a "*fuel poverty*" definition to U.S. households, an estimated 14.7 million (12.6%) spent 10% or more of their *income* on home energy (includes electricity, natural gas, fuel oil, LP gas, but excludes wood, coal, and kerosene). For 15.1 million households (12.9%), spending on home energy amounted to 10% or more of total household *spending*. Factoring in price changes in home energy from 2005 through 2008, increased home energy prices over the period are estimated to increase the number of "fuel poor" households from 14.7 million to 17.2 million, when viewed in terms of household income, and from 15.1 million to 18.7 million, when viewed in terms of household spending – an increase of 17% and 24%, respectively in the number of "fuel poor" households. It should be cautioned in interpreting these numbers that households would likely change their behavior when facing increased fuel costs, and the actual number of "*fuel poor*" households resulting from energy price increases would be less than that shown in **Table 3**.

**Table 3. Estimated Number of "Fuel Poor" Households --
2005 Baseline and Baseline Adjusted for
Fuel Price Inflation from 2005 through 2008
(Fuel Burden of 10% or more of Income or Total Spending)
(Numbers in 1,000's)**

	Fuel as a share of income		Fuel as a share of spending	
	Number	Percent	Number	Percent
Baseline (pre-inflation)	14,725	12.6%	15,077	12.9%
After excess inflation (2005 - 2008)	17,227	14.7%	18,716	16.0%
Change	2,502	17.0%	3,639	24.1%

Source: Estimates prepared by the Congressional Research Service (CRS) based on analysis of Bureau of Labor Statistics 2005 Consumer Expenditure Survey data and fuel price data from the U.S. Department of Energy, U.S. Energy Information Administration (issued May 6, 2008).



Memorandum

July 15, 2008

TO: House Ways and Means Committee
Attention: Matt Weidinger

FROM: Thomas Gabe
Specialist in Social Policy
Domestic Social Policy Division

SUBJECT: Update of Energy and Food Prices

This memorandum is in response to your request for updated forecasts of food and energy prices that were originally included in a May 14, 2008 CRS memorandum entitled "Effects of Increasing Energy and Food Costs on Poor and Low-Income Households' Living Standards." As food and energy prices have increased since then, the effects on poor and low-income households would be somewhat greater than estimated in the May 14th memorandum. As we discussed, estimating those effects would take longer than the time available to meet your needs, so only updated price information is included in this memorandum. **Table 1** and **Figure 1**, depicting food and energy prices that were included in the May 14th memorandum, have been updated here to reflect the most recently available price forecasts for 2008. Please don't hesitate to call me at 7-7357 if you have further questions.

Food price forecasts for 2008 presented in the May 14th memorandum were based on U.S. Department of Agriculture (USDA) Economic Research Service's (ERS) forecast issued on April 25, 2008. The estimates included here are based on the USDA ERS' most recent forecast, issued on June 20, 2008. Back in April, the ERS was forecasting overall food price inflation of between 4.0% and 5.0% (5% was used in the May 14th memorandum), whereas in June 2008, the ERS is forecasting overall food price inflation of between 4.5% and 5.5%, with inflation of food purchased at home ranging from 5.0% to 6.0%. The high end of the forecasted range is presented in **Table 1** and **Figure 1**, as the ERS June forecast does not explicitly account for potentially higher corn and soybean prices that may result from recent flooding in the Midwest.

Most recent energy price forecasts are higher than earlier forecasts presented in the May 14th memorandum. For example, the U.S. Department of Energy (DOE), U.S. Energy Information Administration (EIA) May 6, 2008 forecast for home fuel oil was \$2.99 per gallon; the most recent (July 8) forecast for home fuel oil in 2008 is \$3.40 per gallon. Similarly, natural gas for 2008 was forecasted at \$14.40 per 1,000 cubic feet back May, but

in July was forecasted at \$15.11 per 1,000 cubic feet, and gasoline for 2008, forecasted at \$3.57 per gallon back in May, is forecasted at \$3.89 per gallon based on EIA's July forecast.

The forecast for core-inflation (all items other than food and energy) presented here for 2008 is 2.2%; it's the same as that used in the May 14th memorandum that was based on the Congressional Budget Office (CBO) Economic Projections, released February 15, 2008. The CBO has not issued an updated forecast. Core inflation is arrived at by factoring out direct food and energy components, which tend to be subject to volatile price shocks; core inflation is often used to measure underlying long-term inflation trends in the economy. Ultimately, long-term changes in energy prices may feed back to affect the prices of other goods and services, which will be captured in the core CPI.

Cumulative price changes over the 2005 to 2008 (forecast) period are presented in **Figure 1**. In the figure, prices are normalized to 2005, which has a base value of 1.0. In addition to changes in energy (residential electricity, fuel oil, residential natural gas, propane (liquid petroleum, or LP gas), gasoline (retail, all grades including taxes)), and food prices, changes in core price inflation for all goods and services other than food and energy (CPI-U-Core) is shown.

Figure 1 shows, for example, that fuel oil prices are forecasted to be over twice (2.1 times) as high in 2008 than in 2005 – over 15 times that of core inflation (7.2%). Gasoline prices are forecasted to be 68% higher in 2008 than in 2005. Residential electricity prices and natural gas prices are both forecasted to be 19% higher in 2008 than in 2005. Food prices are forecasted to be nearly 12% higher in 2008, than in 2005.

Table 1. Food and Energy Prices for 2005 through 2007 and Forecasted Prices for 2008

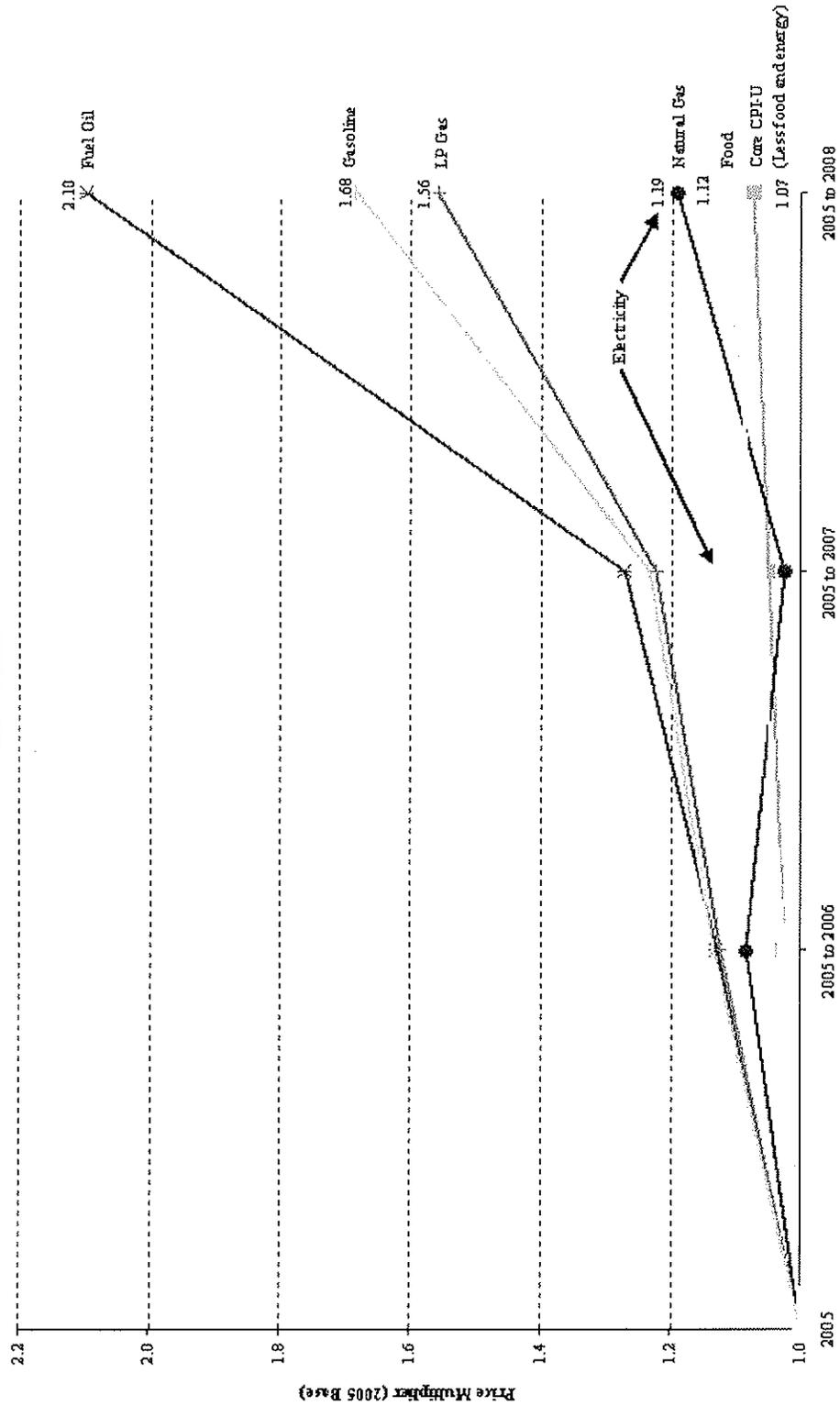
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Food away from home (CPI-U)	193.4	199.4	206.66	215.96
	Annual Inflation Rate			
	2005 to 2006	2006 to 2007	2007 to 2008	
CPI - U	3.2%	2.9%	2.8%	
CPI-U-Core (Less Food and Energy)	2.5%	2.3%	2.2%	
Electricity (Residential) (cents per kilowatt hour)	10.6%	1.9%	5.7%	
Fuel Oil (cents per gallon)	13.0%	12.6%	65.0%	
Natural Gas (dollars per 1,000 cubic feet)	8.3%	-5.5%	16.2%	
LP Gas (cents per gallon)	12.5%	8.6%	27.4%	
Gasoline (All Grades, After Taxes) (cents per gallon)	13.4%	8.8%	36.5%	
Food CPI-U	2.4%	4.0%	5.5%	
Food at home (CPI-U)	1.7%	4.2%	6.0%	
Food away from home (CPI-U)	3.1%	3.6%	4.5%	
	Cumulative Price Changes -- Base Year 2005			
	2005	2005 to 2006	2005 to 2007	2005 to 2008
CPI - U	1.0000	1.0323	1.0617	1.0914
CPI-U-Core (Less Food and Energy)	1.0000	1.0250	1.0490	1.0720
Electricity (Residential) (cents per kilowatt hour)	1.0000	1.1064	1.1277	1.1915
Fuel Oil (cents per gallon)	1.0000	1.1296	1.2716	2.0988
Natural Gas (dollars per 1,000 cubic feet)	1.0000	1.0827	1.0236	1.1898
LP Gas (cents per gallon)	1.0000	1.1250	1.2216	1.5568
Gasoline (All Grades, After Taxes) (cents per gallon)	1.0000	1.1342	1.2338	1.6840
Food CPI-U	1.0000	1.0236	1.0641	1.1226
Food at home (CPI-U)	1.0000	1.0174	1.0603	1.1239
Food away from home (CPI-U)	1.0000	1.0310	1.0686	1.1166

Table 1. Food and Energy Prices for 2005 through 2007 and Forecasted Prices for 2008

	Prices in Excess of Core Inflation – Cumulative Price Changes – Base Year 2005			
	2005	2005 to 2006	2005 to 2007	2005 to 2008
Electricity (Residential) (cents per kilowatt hour)	1.0000	1.0814	1.0787	1.1194
Fuel Oil (cents per gallon)	1.0000	1.1046	1.2226	2.0267
Natural Gas (dollars per 1,000 cubic feet)	1.0000	1.0577	0.9747	1.1177
LP Gas (cents per gallon)	1.0000	1.1000	1.1726	1.4848
Gasoline (All Grades, After Taxes) (cents per gallon)	1.0000	1.1092	1.1848	1.6119
Food CPI-U	1.0000	0.9986	1.0151	1.0505
Food at home (CPI-U)	1.0000	0.9924	1.0113	1.0519
Food away from home (CPI-U)	1.0000	1.0060	1.0196	1.0446

Source: Table prepared by the Congressional Research Service (CRS). Energy price data from the U.S. Department of Energy, U.S. Energy Information Administration, issued July 8, 2008. Food price and Core CPI-U data from the U.S. Bureau of Labor Statistics and U.S. Department of Agriculture, Economic Research Service (food price forecast for 2008, issued June 20, 2008). Core CPI-U forecast based on Congressional Budget Office Economic Projections, released February 15, 2008.

Figure 1. Change in Prices for Food, Energy, and All Other Goods and Services
2005 to 2008



Source: Figure prepared by the Congressional Research Service. Energy price data from the U.S. Department of Energy, U.S. Energy Information Administration, issued July 8, 2008. Food price and Core CPI-U data from the U.S. Bureau of Labor Statistics and U.S. Department of Agriculture, Economic Research Service (food price forecast for 2008, issued June 20, 2008). Core CPI-U forecast based on Congressional Budget Office Economic Projections, released February 15, 2008.

