

# **The State of Senior Hunger in America 2012: An Annual Report**

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## Executive Summary

In this report we provide an overview of the extent and distribution of food insecurity in 2012 among seniors, along with trends over the past decade using national and state-level data from the December Supplements to the Current Population Survey (CPS). Based on the full set of 18 questions in the Core Food Security Module (CFSM), the module used by the USDA to establish the official food insecurity rates of households in the United States, our emphasis here is on quantifying the senior population facing the threat of hunger (i.e. marginally food insecure). A supplement to this report also presents evidence on seniors at risk of hunger (i.e. food insecure) and on seniors facing hunger (i.e. very low food secure).

This report demonstrates that seniors in 2012 continued to face increasing challenges meeting food need. Specifically, we find that

- 15.3% of seniors face the threat of hunger. This translates into 9.3 million seniors.
- Those living in states in the South and Southwest, those who are racial or ethnic minorities, those with lower incomes, and those who are younger (ages 60-69) are most likely to be threatened by hunger.
- Out of those seniors who face the threat of hunger, the majority have incomes above the poverty line and are white.
- From 2001 to 2012, the fraction of seniors experiencing the threat of hunger increased by 44%. The number of seniors rose by 98% which also reflects the growing population of seniors.
- Since the onset of the recession in 2007 until 2012, the number of seniors experiencing the threat of hunger has increased by 49%.

Increasing numbers of seniors in our country are going without enough food due to economic constraints. This has not slowed down in recent years even in the midst of an improving economy and financial markets, and based on the findings regarding food insecurity and health in Ziliak and Gunderson (2013a), this threatens to further deteriorate the health of millions of our seniors.

# I. FOOD INSECURITY IN 2012

We document the state of hunger among senior Americans ages 60 and older in 2012 using data from the Current Population Survey (CPS). In December of each year, households respond to a series of 18 questions (10 questions if there are no children present) that make up the Core Food Security Module (CFSM) in the CPS. (See the Appendix for more details on the CPS and CFSM.) Each question is designed to capture some aspect of food insecurity and, for some questions, the frequency with which it manifests itself. Respondents are asked questions about their food security status in the last 30 days as well as over the past 12 months. We focus on the questions referring to the past year.

Consistent with the nomenclature and categorizations in our past reports (Ziliak and Gundersen 2013b), we consider three characterizations of food insecurity: the threat of hunger, when a person is defined as marginally food insecure due to having answered affirmatively to one or more questions on the CFSM; the risk of hunger, when a person is food insecure (three or more affirmative responses to questions on the CFSM); and facing hunger, when a person is very low food secure (8 or more affirmative responses to questions in households with children; 6 or more affirmative responses in households without children). This means that the threat of hunger is the broadest category of food insecurity since it encompasses those responding to at least one question on the CFSM. The next broadest category is the risk of hunger since this group encompasses those who are either food insecure or very low food secure. This means that the most narrow, and in turn, most severe, category in our taxonomy is facing hunger. Box 1 summarizes the categories. For the purpose of this report we focus on the threat of hunger, but a supplement to the report provides a parallel analysis for seniors at risk of hunger and those facing hunger.

## Box 1: Categories of Food Insecurity

	USDA Classification	Number of Affirmative Responses to CFSM
Fully Food Secure	Fully Food Secure	0
Threat of Hunger	Marginally Food Insecure	1 or more
Risk of Hunger	Food Insecure	3 or more
Facing Hunger	Very Low Food Secure	8 or more (households with children) 6 or more (households without children)

In Table 1 we present estimates of food insecurity among seniors in 2012. Overall, 15.3% faced the threat of hunger, which translates into 9.3 million seniors, or a half million more than in 2011. The table also presents estimates of food insecurity across selected socioeconomic categories. Here we see great heterogeneity across the senior population. For example, for those with incomes below the poverty line, 48.8% face the threat of hunger. In contrast, seniors with incomes greater than twice the poverty line, this number falls dramatically to 6.9%. Turning to race, white seniors have food insecurity rates that are less than half the rates for African-American seniors. (The category of “other race” includes those American Indians, Asians, and Pacific Islanders.) Similarly, Hispanics (of any racial category) have food insecurity rates which are nearly one and a half times the rates of non-Hispanics.

**Table 1. The Extent of the Threat of Senior Hunger in 2012**

	Threat of hunger
Overall	15.33%
By Income	
Below the Poverty Line	48.79
Between 100% and 200% of the Poverty Line	29.98
Above 200% of the Poverty Line	6.88
Income Not Reported	9.88
By Race and Ethnicity	
White	13.45
Black	30.64
Other	17.65
Hispanic	31.86
Non-Hispanic	13.94
By Marital Status	
Married	11.09
Widowed	18.30
Divorced or Separated	26.92
Never Married	21.97
By Metropolitan Location	
Non-Metro	16.75
Metro	14.99
By Age	
60-64	18.23
65-69	16.41
70-74	13.98
75-79	13.60
80 and older	11.58
By Employment Status	
Employed	11.73
Unemployed	30.14
Retired	12.61
Disabled	41.31
By Gender	
Male	13.79
Female	16.60
By Grandchild Present	
No Grandchild Present	14.35
Grandchildren Present	34.67

Source: Authors' calculations of December 2012 Current Population Survey.  
The numbers in the table show the rates of marginal food insecurity.

The threat of hunger among divorced or separated seniors is two to three times greater than married seniors, and younger seniors, especially those under age 70, are at heightened risk in comparison to 71 and older. Likewise, the threat of hunger is 3-4 times higher among the disabled in comparison to the retired or employed, and if a grandchild is present, food insecurity is more than twice as likely than among households with no grandchildren present.

Table 1 allows us to see the proportions of persons within any category who are food insecure and, with this information, we can make statements about who is most in danger of being food insecure. For example, those with lower incomes are substantially more likely to be food insecure in any of our food insecurity categories than those with higher incomes. Also of interest, though, is the distribution of senior hunger. In other words, out of those who are food insecure, what proportion fall into a particular category? We present these results in Table 2.

As seen in Table 2, the majority of seniors facing the threat of hunger have incomes above the poverty line. For example, out of those reporting income, nearly 2 in 3 seniors under the threat of hunger have incomes above the poverty line. A similar story holds for race – while African-Americans are at greater risk of hunger than whites, almost 3 in 4 food insecure seniors are white. As discussed above, there is a decline in food insecurity rates for older seniors. It still remains, however, that 13.4% of seniors facing the threat of hunger are over age 80. And while the rates of food insecurity are lowest for retired persons, they make up half of the population under the threat of hunger.

**Table 2. The Distribution of the Threat of Senior Hunger in 2012**

By Income	
Below the Poverty Line	29.02%
Between 100% and 200% of the Poverty Line	32.22
Above 200% of the Poverty Line	21.08
Income Not Reported	17.65
By Race	
White	74.49
Black	19.18
Other	6.33
By Ethnicity	
Non-Hispanic	83.91
Hispanic	16.09
By Marital Status	
Married	43.60
Widowed	24.59
Divorced or Separated	23.82
Never Married	7.99
By Metropolitan Location	
Non-Metro	21.16
Metro	78.84
By Age	
60-64	35.16
65-69	25.06
70-74	15.17
75-79	11.18
80 and older	13.43
By Employment Status	
Employed	21.29
Unemployed	3.72
Retired	50.24
Disabled	24.75
By Gender	
Male	40.78
Female	59.22
By Grandchild Present	
No Grandchild Present	89.13
Grandchildren Present	10.87

Source: Authors' calculations from 2012 December Current Population Survey.  
The numbers in the table sum to 100 percent within each subcategory.

In Table 3 we present state level estimates of the threat of senior hunger for 2012. The range for the threat of hunger spans from 8.1% in Minnesota to 25.4% in Arkansas. In Table 4 we highlight the ten states with the highest rates of senior hunger in 2012. This is the same group of states as in 2011, except that North Carolina has replaced New Mexico, and in most cases the rates are higher than in 2010 or 2011.

**Table 3. State-Level Estimates of Threat of Senior Hunger in 2012**

AL	17.53	HI	14.4	MI	12.12	NC	20.08	UT	14.77
AK	11.47	ID	10.88	MN	8.13	ND	13.24	VT	12.33
AZ	13.61	IL	14.68	MS	22.67	OH	12.92	VA	11.95
AR	25.44	IN	12.9	MO	16.57	OK	15.42	WA	13.52
CA	16.32	IA	12.79	MT	12.72	OR	16.18	WV	13.18
CO	13.29	KS	13.37	NE	13.48	PA	12.93	WI	9.72
CT	13.96	KY	15.07	NV	17.12	RI	16.2	WY	16.06
DE	12.91	LA	23.56	NH	10.17	SC	18.43		
DC	15.19	ME	16.11	NJ	13.72	SD	12.97		
FL	14.41	MD	13.92	NM	13.13	TN	21.43		
GA	16.99	MA	11.63	NY	15.69	TX	19.82		

Source: Authors' calculations. The numbers are two-year averages found by summing the number of marginally food insecure seniors by state across the 2011-2012 December Current Population Surveys and dividing by the corresponding total number of seniors in each state across the two years.

**Table 4. Top Ten States in Terms of Threat of Senior Hunger in 2012**

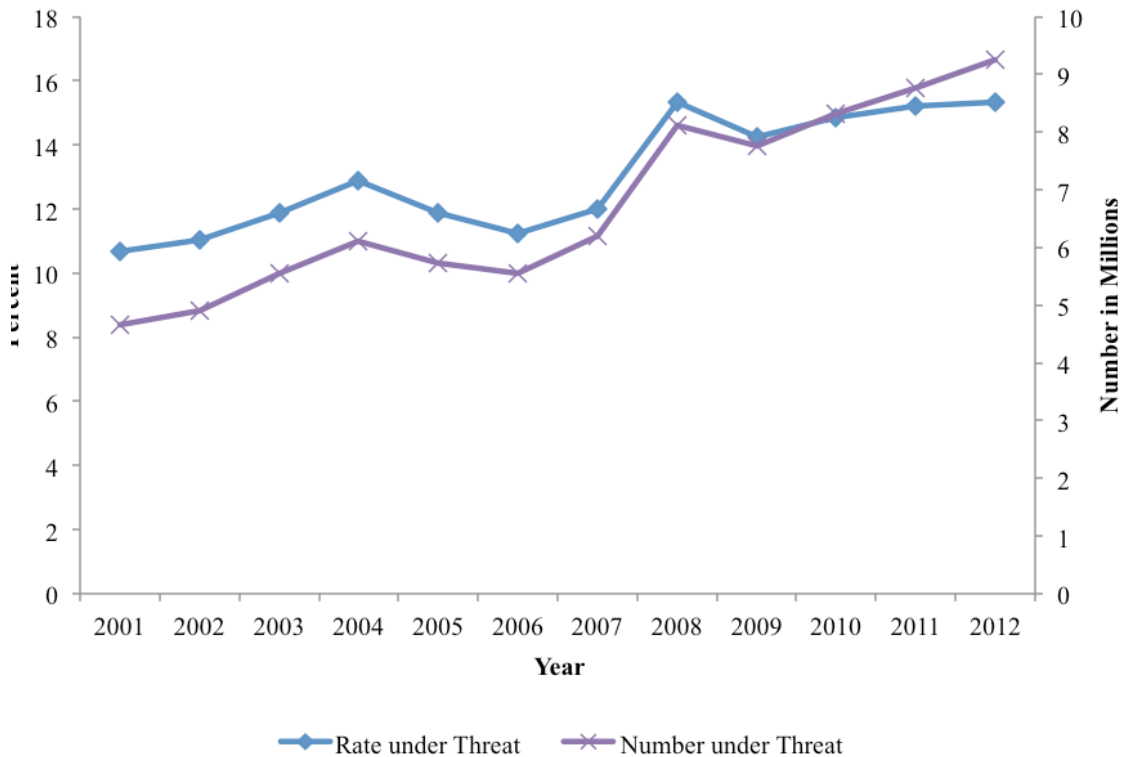
AR	25.44
LA	23.56
MS	22.67
TN	21.43
NC	20.08
TX	19.82
SC	18.43
AL	17.53
NV	17.12
GA	16.99



## II. FOOD INSECURITY OVER TIME

To place the 2012 estimates into perspective, we now examine trends in the threat of hunger (marginal food insecurity) since 2001. We describe the trends for the full population of seniors along with select subgroups. In Figure 1 we display results for the full population in terms of the percentage of seniors (left-hand axis) and number of seniors in millions (right-hand axis). As seen there, there was a substantial and statistically significant increase in food insecurity since the start of the recession in 2007; the fraction of seniors under the threat of hunger increased nearly 30% from 2007-2012. And reflecting the fact that an increasing percentage of the U.S. population is over age 60, the number of seniors under the threat of hunger rose 50% since 2007. Overall, from 2001 to 2012 the fraction of seniors experiencing the threat of hunger increased by 44%, while the number of seniors rose 98%.

**Figure 1. Trends in Threat of Senior Hunger**



In Table 5 we take a deeper look into underlying changes in the composition of marginally food insecure seniors from 2011 to 2012. The table presents percentage point changes by the same set of socioeconomic characteristics in Table 1. In the first row, the results for the full population of seniors show that marginal food insecurity rose a small 0.12 percentage points from 2011 to 2012. However, in the subsequent rows we see a wide degree of variation in terms of changes that are masked by the overall changes. Specifically, those living in poverty, in a non-metro area, between the ages of 75 and 79, and the disabled had quantitatively large and statistically significant increases in the threat of hunger over the past year. The unemployed, on the other hand, saw a reduction in risk of marginal food insecurity.

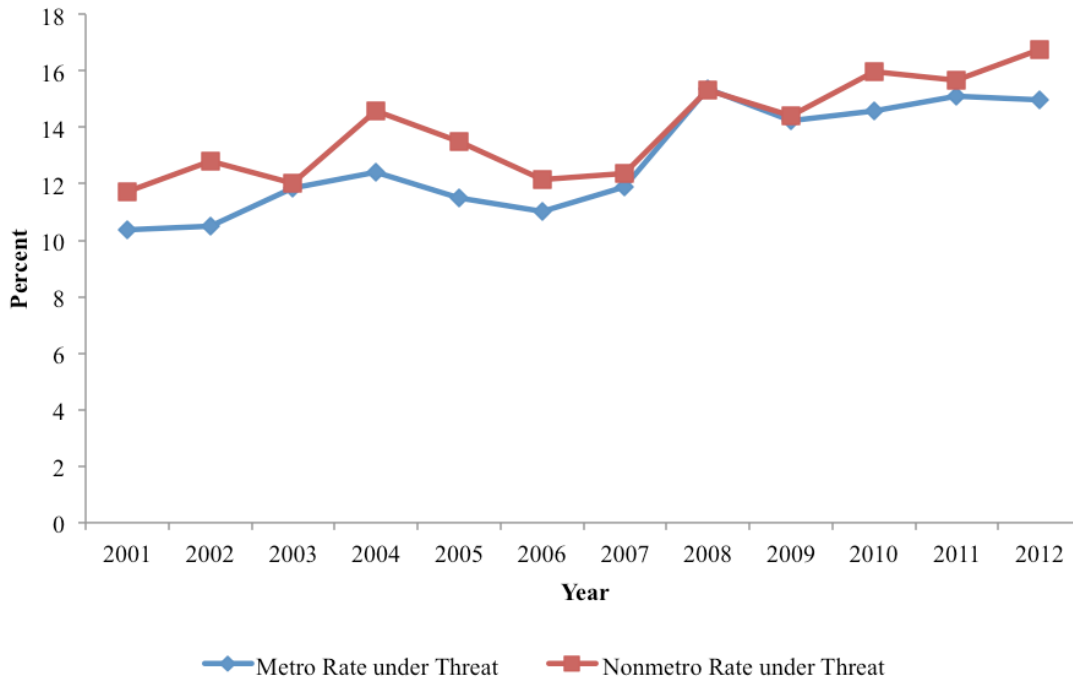
**Table 5. Changes in the Composition of Threat of Senior Hunger from 2011 to 2012**

Overall	0.12%
By Income	
Below the Poverty Line	2.70*
Between 100% and 200% of the Poverty Line	0.23
Above 200% of the Poverty Line	0.30
Income Not Reported	0.09
By Race	
White	0.12
Black	-0.57
Other	0.87
Hispanic	0.08
By Marital Status	
Married	0.09
Widowed	-0.26
Divorced or Separated	1.20
Never Married	-0.60
By Metropolitan Location	
Non-Metro	1.09*
Metro	-0.12
By Age	
60-64	0.70
65-69	-0.62
70-74	-1.08
75-79	1.83**
80 and older	-0.09
By Employment Status	
Employed	0.56
Unemployed	-6.89**
Retired	-0.11
Disabled	2.74*
By Gender	
Male	0.28
Female	-0.01
By Grandchild Present	
No Grandchild Present	0.10
Grandchildren Present	-0.23

Source: Authors' calculations. The numbers in the table reflect percentage point changes from 2011-2012. The asterisks denote statistical significance at the following levels: \*\*\* p<0.01; \*\* p<0.05; \* p<0.1

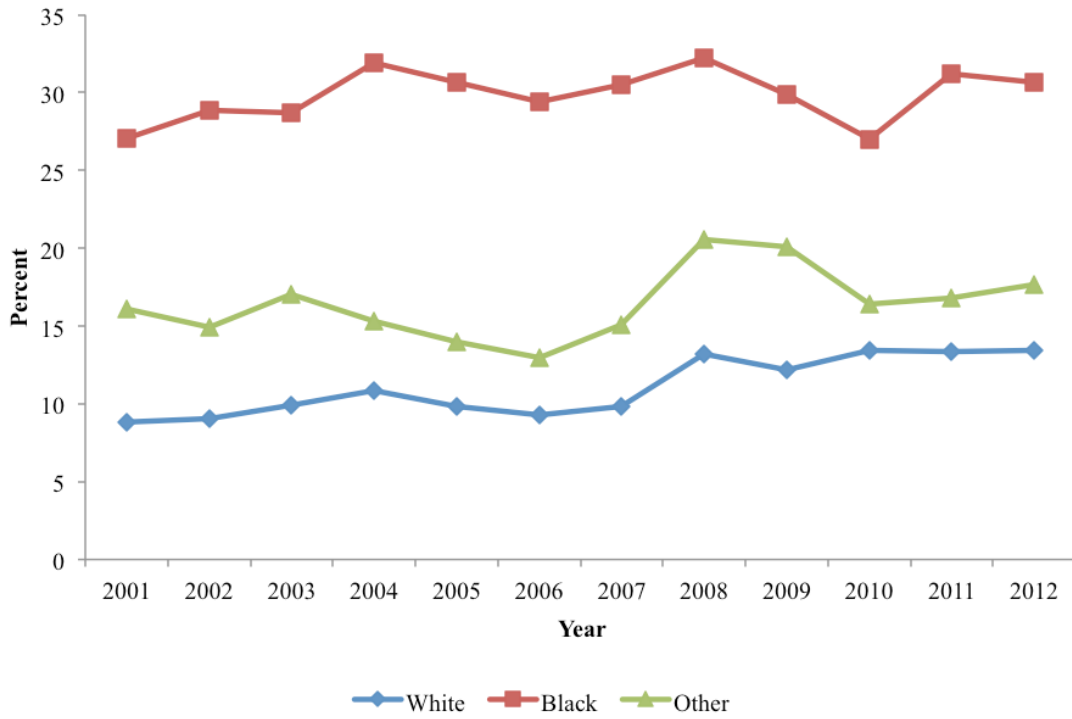
In the next set of figures we examine trends in food insecurity since 2001 across a variety of subpopulations found in Tables 1 and 5. We begin in Figure 2 with trends in food insecurity for seniors living in metropolitan areas versus nonmetropolitan areas. The figure shows that, in the years leading up to the Great Recession there were differences between metro and non-metro areas in terms of the threat of hunger, but this seemed to dissipate during the recession. This gap, however, has re-emerged in recent years, reaching almost 2 percentage points in 2012.

**Figure 2. Trends in Threat of Senior Hunger by Metropolitan Status**



Figures 3 and 4 depict trends in the threat of hunger across different races and ethnicity. As discussed above, the rates of food insecurity for blacks are substantially higher than whites. Figure 3 reveals that these differences were present in each year from 2001 to 2012. The proportion of seniors facing a threat to hunger were fairly stable among blacks over the past decade but on the other hand the trend has been increasing among whites. In Figure 4 we present trends based on Hispanic ethnicity. In most years Hispanics face rates of marginal food insecurity 2-3 times higher than non-Hispanics. One key difference in the trajectories over time is with respect to what occurred after the sharp increase in 2008 for the threat of hunger. After this increase, in 2009 for Hispanics there was a fall to levels just above those in 2007 in contrast to non-Hispanics who did not see such a sharp fall. However, since 2009 there has been a slight trend increase both among Hispanics and non-Hispanics.

**Figure 3. Trends in Threat of Senior Hunger by Race**



**Figure 4. Trends in Threat of Senior Hunger by Hispanic Ethnicity**

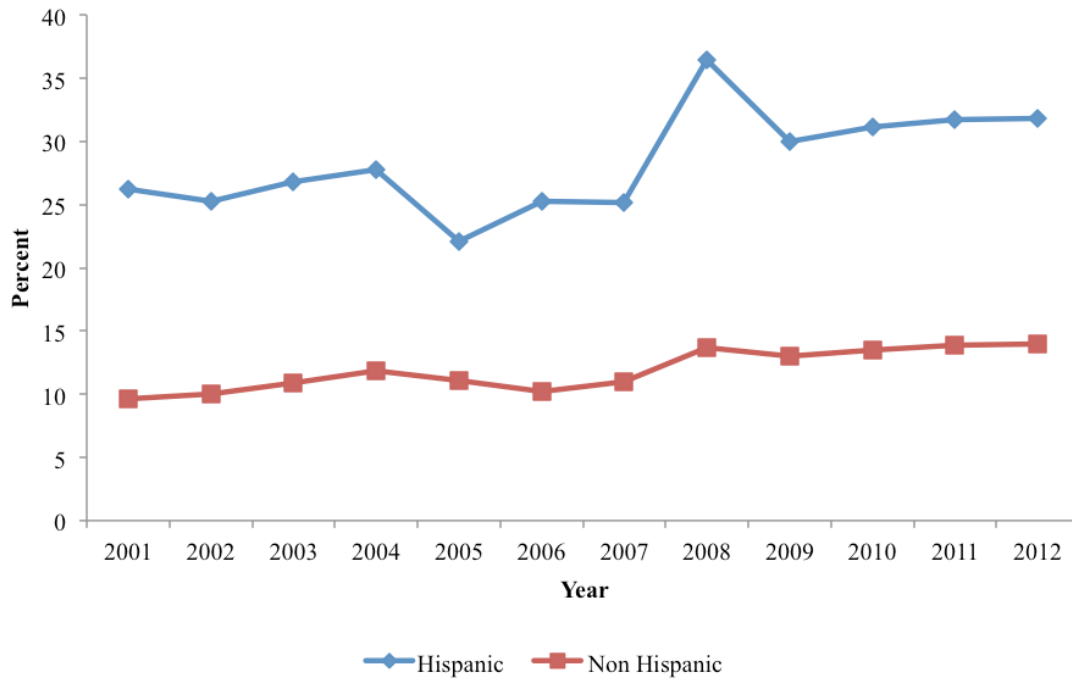
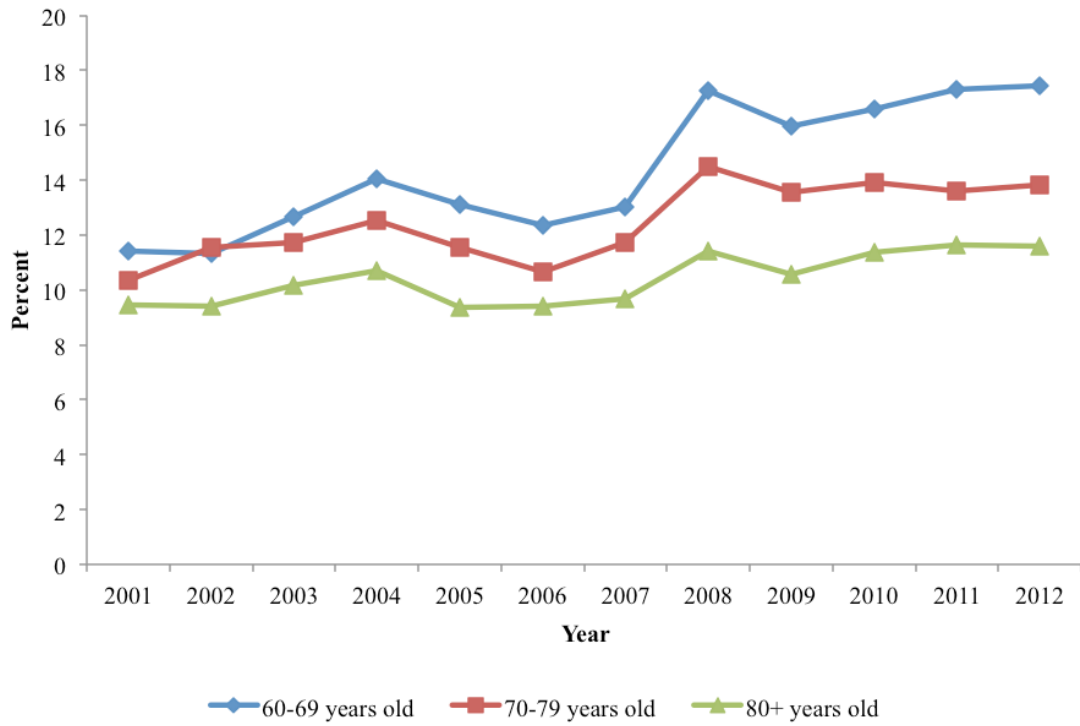


Figure 5 presents a parallel set of charts for seniors of three broad age groups—60-69 years old, 70-79 years old, and age 80 and older. There were sharp increases in the threat of hunger from 2007 to 2008 across all three age groups and these rates remain, in 2012, substantially above those found in 2007.

**Figure 5. Trends in Threat of Senior Hunger by Age**



### III. CONCLUSION

This report demonstrates that food insecurity among seniors in America is a continued crisis facing the nation. Despite the end of the Great Recession in 2009, nearly 1 in 6 seniors faced the threat of hunger in 2012. And, even more troubling is the doubling in the fraction of seniors under the threat of hunger in 2012 compared to 2001. Given the compelling evidence in Ziliak and Gundersen (2013a) that food insecurity is associated with a host of poor nutrition and health outcomes among seniors, this report implies that these high rates of food insecurity among seniors will likely lead to additional public health challenges for our country. This suggests that a key potential avenue to stem the growth of health care expenditures on older Americans is to ameliorate the problem of food insecurity.

# APPENDIX

The CPS is a nationally representative survey conducted by the Census Bureau for the Bureau of Labor Statistics, providing employment, income and poverty statistics. Households are selected to be representative of civilian households at the state and national levels, using suitably appropriate sampling weights. The CPS does not include information on individuals living in group quarters including nursing homes or assisted living facilities. For this report and previous reports, we use data from the December Supplement which contains the Core Food Security Module (CFSM). The questions from the CFSM are found in Appendix Table 1. Because our focus is on hunger among seniors, our CPS sample is of persons age 60 and older. In 2012 this results in 22,761 sample observations. Appendix Table 2 presents selected summary statistics for the CPS sample.

**Appendix Table 1: Questions on the Core Food Security Module**

Food Insecurity Question	Asked of Households with Children	Asked of Households without Children
1. “We worried whether our food would run out before we got money to buy more.” Was that <b>often</b> , <b>sometimes</b> , or never true for you in the last 12 months?	x	x
2. “The food that we bought just didn’t last and we didn’t have money to get more.” Was that <b>often</b> , <b>sometimes</b> , or never true for you in the last 12 months?	x	x
3. “We couldn’t afford to eat balanced meals.” Was that <b>often</b> , <b>sometimes</b> , or never true for you in the last 12 months?	x	x
4. “We relied on only a few kinds of low-cost food to feed our children because we were running out of money to buy food.” Was that <b>often</b> , <b>sometimes</b> , or never true for you in the last 12 months?	x	
5. In the last 12 months, did you or other adults in the household ever cut the size of your meals or skip meals because there wasn’t enough money for food? (Yes/No)	x	x
6. “We couldn’t feed our children a balanced meal, because we couldn’t afford that.” Was that <b>often</b> , <b>sometimes</b> , or never true for you in the last 12 months?	x	
7. In the last 12 months, did you ever eat less than you felt you should because there wasn’t enough money for food? (Yes/No)	x	x
8. (If yes to Question 5) How often did this happen— <b>almost every month</b> , <b>some months but not every month</b> , or in only 1 or 2 months?	x	x
9. “The children were not eating enough because we just couldn’t afford enough food.” Was that <b>often</b> , <b>sometimes</b> , or never true for you in the last 12 months?	x	
10. In the last 12 months, were you ever hungry, but didn’t eat, because you couldn’t afford enough food? (Yes/No)	x	x
11. In the last 12 months, did you lose weight because you didn’t have enough money for food? (Yes/No)	x	x
12. In the last 12 months, did you ever cut the size of any of the children’s meals because there wasn’t enough money for food? (Yes/No)	x	
13. In the last 12 months did you or other adults in your household ever not eat for a whole day because there wasn’t enough money for food? (Yes/No)	x	x
14. In the last 12 months, were the children ever hungry but you just couldn’t afford more food? (Yes/No)	x	
15. (If yes to Question 13) How often did this happen— <b>almost every month</b> , <b>some months but not every month</b> , or in only 1 or 2 months?	x	x
16. In the last 12 months, did any of the children ever skip a meal because there wasn’t enough money for food? (Yes/No)	x	
17. (If yes to Question 16) How often did this happen— <b>almost every month</b> , <b>some months but not every month</b> , or in only 1 or 2 months?	x	
18. In the last 12 months did any of the children ever not eat for a whole day because there wasn’t enough money for food? (Yes/No)	x	

Note: Responses in bold indicate an “affirmative” response.



**Appendix Table 2: Selected Characteristics of Senior Americans Age 60 and older in 2012**

	Percent
Income Categories	
Below 50% of the Poverty Line	1.88
Between 50% and 100% of the Poverty Line	7.24
Between 100% and 200% of the Poverty Line	16.48
Above 200% of the Poverty Line	47.01
Missing Income	27.39
Racial Categories	
White	84.90
African American	9.60
Other	5.50
Hispanic Ethnicity	7.74
Marital Status	
Married	60.25
Widowed	20.61
Divorced or Separated	13.57
Never Married	5.58
Non-Metro	19.37
Region	
Northeast	18.72
Midwest	22.35
South	37.23
West	21.71
Age	
60 to 64	29.56
65 to 69	23.42
70 to 74	16.63
75 to 79	12.60
80 and older	17.79
Employment Status	
Employed	27.83
Unemployed	1.89
Retired	61.10
Disabled	9.18
Education Level	
Less Than High School	15.31
High School Diploma	33.33
Some College	24.17
College Degree	27.19
Food Stamp Recipient	6.29
Grandchild or Parent Present	
No Grandchild and Parent Present	95.19
Grandchild and Parent Present	3.01
Grandchild Present	1.80
Female	54.68
Living Alone	25.01

## References

Ziliak, J., and C. Gundersen. 2013a. *The Health Consequences of Senior Hunger in the United States: Evidence from the 1999-2010 NHANES*. Report submitted to National Foundation to End Senior Hunger.

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