# THE APPALACHIAN REGION: A DATA OVERVIEW FROM THE 2011-2015 AMERICAN COMMUNITY SURVEY Chartbook

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# Prepared for the Appalachian Regional Commission Under Contract #CO-18662-16 March 2017

The authors wish to thank Keith Witt of ARC for his support and guidance.





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#### **FOREWORD**

The data contained in this chartbook come from the 2011-2015 American Community Survey. While the types of demographic and housing data included in Chapters 1 through 4 were also collected in the 2010 decennial census, the types of social and economic data included in Chapters 5 through 11 were not. This is because unlike previous censuses—which consisted of a "short form" of basic demographic and housing questions and a "long form" (used for a sample of households) that also asked detailed questions about social, economic, and housing characteristics—the 2010 census only had a short form.

The decennial long form has been replaced by the American Community Survey (ACS), a nationwide study collected continuously every year in every county in the United States. The ACS is designed to provide communities with reliable and timely demographic, social, economic, and housing data each year. However, the annual sample size of the ACS is much smaller than the sample size of the decennial census long form; therefore, data from five years must be combined to provide reliable estimates for geographic areas with fewer than 20,000 people. Since a number of counties in the Appalachian Region have fewer than 20,000 residents, we must use the 2011-2015 ACS data to have comparable statistics for all 420 counties in the Region.

The ACS five-year estimates for 2011-2015 represent concepts that are fundamentally different from those associated with data from the decennial census. While the main function of the census is to provide *counts* of people for congressional apportionment and legislative redistricting, the primary purpose of the ACS is to measure the changing *characteristics* of the U.S. population. Moreover, while the decennial census provides a "snapshot" of the U.S. population once every 10 years, the ACS has been described as a "moving video image" that is continually updated. Finally, while the census provides "point in time" estimates designed to approximate an area's characteristics on a specific date, the ACS provides "period" estimates that represent data collected over a period of time. The five-year estimates in this chartbook, therefore, are data collected over the five-year (or 60-month) period from January 2011 through December 2015. These ACS estimates are *not* averages of monthly or annual values, but rather an *aggregation* of data collected over the five-year period.

For areas with consistent population characteristics throughout the calendar year, ACS period estimates might not differ much from those that would result from a point-in-time survey like the decennial census. However, ACS period estimates might be noticeably different from point-in-time estimates for areas with seasonal populations or those that experience a natural disaster such as a hurricane. For example, a resort community in the upper Midwest might be dominated by locals in the winter months and by temporary workers and tourists in the summer months, with a corresponding decrease in employment rates during the winter and increase in these rates during the summer. In such a community, the ACS period estimate of the percent of persons in the labor force, which is based on data across the entire calendar year, would likely be higher than a decennial census point-in-time estimate from April 1.

And with two non-overlapping five-year periods (2011-2015 and 2006-2010), we can study trends in the data. However, the Census Bureau recommends caution in some instances, due to the changes in question wording and the coding of responses. And in some years, the ACS has added or removed certain questions. For example, the ACS added a new question on health insurance in 2008, which was the same year that a new set of questions on disability status replaced the ones asked in previous years. As a result, 2006-2010 data for these two items are not available to measure trends. More information about comparing the 2006-2010 and 2011-2015 ACS data is available on the Web page, "Comparing 2006-2010 ACS 5-year and 2011-2015 ACS 5-year", through the Census Bureau's website.

While ACS five-year data are needed to provide reliable estimates for areas with small populations, they can make it difficult to track trends in these areas. The 2006-2010 ACS data illustrate this problem, as they are for a time period that covers three distinct periods of economic activity: the years immediately preceding the "Great Recession" of December 2007 through June 2009; the recession itself, and the 18 months of economic recovery that followed the downturn. Since the 2006-2010 ACS pools data from all three periods, it smooths out the extreme variations in economic measures that would be evident in annual data from this five-year period.

This year's chartbook also includes two reference maps—one of the five Appalachian subregions, and one of the five rural-urban county types. Both the subregions and county types are referenced throughout the report. These maps are in Appendix A.

# **CHAPTER 1: POPULATION BASICS**

Table 1.1: Population, Land Area, and Population Density in the Appalachian Region, 2011-2015

Population, Land Area, and Density	Population,	Change Sinc	e 2006-2010	Land Area	Population per Square Mile of	
Population, Land Area, and Density	2011-2015	Number	Percent	(Square Miles)	Land Area, 2011-2015	
United States	316,515,021	+ 12,549,749	+ 4.1	3,531,905	89.6	
Appalachian Region	25,417,532	+ 415,186	+ 1.7	204,452	124.3	
Subregions						
Northern Appalachia	8,336,272	- 51,520	- 0.6	56,980	146.3	
North Central Appalachia	2,425,882	+ 20,113	+ 0.8	29,337	82.7	
Central Appalachia	1,900,772	- 14,200	- 0.7	29,773	63.8	
South Central Appalachia	4,777,566	+ 123,586	+ 2.7	34,997	136.	
Southern Appalachia	7,977,040	+ 337,207	+ 4.4	53,365	149.	
County Types						
Large Metros (pop. 1 million +)	5,963,130	+ 199,860	+ 3.5	18,815	316.9	
Small Metros (pop. <1 million)	10,733,709	+ 228,785	+ 2.2	54,302	197.	
Nonmetro, Adjacent to Large Metros	2,201,683	- 5,677	- 0.3	25,382	86.7	
Nonmetro, Adjacent to Small Metros	3,981,497	+ 4,789	+ 0.1	58,591	68.0	
Rural (nonmetro, not adj. to a metro)	2,537,513	- 12,571	- 0.5	47,363	53.6	
Alabama	4,830,620	+ 117,969	+ 2.5	50,645	95.4	
Appalachian Alabama	3,092,319	+ 71,466	+ 2.4	25,763	120.0	
Non-Appalachian Alabama	1,738,301	+ 46,503	+ 2.7	24,882	69.9	
Georgia	10,006,693	+ 537,878	+ 5.7	57,513	174.0	
Appalachian Georgia	3,047,462	+ 199,001	+ 7.0	11,378	267.8	
Non-Appalachian Georgia	6,959,231	+ 338,877	+ 5.1	46,135	150.8	
Kentucky	4,397,353	+ 111,525	+ 2.6	39,486	111.4	
Appalachian Kentucky	1,178,147	- 4,492	- 0.4	18,231	64.6	
Non-Appalachian Kentucky	3,219,206	+ 116,017	+ 3.7	21,256	151.4	
Maryland	5,930,538	+ 234,115	+ 4.1	9,707	611.0	
Appalachian Maryland	252,632	+ 1,520	+ 0.6	1,529	165.2	
Non-Appalachian Maryland	5,677,906	+ 232,595	+ 4.3	8,178	694.3	
Mississippi	2,988,081	+ 46,090	+ 1.6	46,923	63.7	
Appalachian Mississippi	628,965	+ 2,431	+ 0.4	12,400	50.	
Non-Appalachian Mississippi	2,359,116	+ 43,659	+ 1.9	34,523	68.	
New York	19,673,174	+ 443,422	+ 2.3	47,126	417.	
Appalachian New York	1,055,972	- 12,073	- 1.1	11,681	90.4	
Non-Appalachian New York	18,617,202	+ 455,495	+ 2.5	35,445	525.	
North Carolina	9,845,333	+ 574,155	+ 6.2	48,618	202.	
Appalachian North Carolina	1,716,912	+ 43,621	+ 2.6	11,887	144.4	
Non-Appalachian North Carolina	8,128,421	+ 530,534	+ 7.0	36,731	221.	
Ohio	11,575,977	+ 63,546	+ 0.6	40,861	283.3	
Appalachian Ohio	2,023,656	- 22,166	- 1.1	15,978	126.7	
Non-Appalachian Ohio	9,552,321	+ 85,712	+ 0.9	24,882	383.9	
Pennsylvania	12,779,559	+ 166,854	+ 1.3	44,743	285.0	
Appalachian Pennsylvania	5,770,892	- 16,354	- 0.3	36,444	158.3	
Non-Appalachian Pennsylvania	7,008,667	+ 183,208	- 0.3 + 2.7	8,298	844.6	
South Carolina		+ 266,148	+ 5.9	30,061	158.9	
	4,777,576	•		,		
Appalachian South Carolina	1,208,294	+ 64,309 + 201,839	+ 5.6	3,824	316.0	
Non-Appalachian South Carolina	3,569,282	,	+ 6.0	26,237	136.0	
Tennessee	6,499,615	+ 264,647	+ 4.2	41,235	157.0	
Appalachian Tennessee	2,827,183	+ 81,757	+ 3.0	20,119	140.	
Non-Appalachian Tennessee	3,672,432	+ 182,890	+ 5.2	21,116	173.	
Virginia	8,256,630	+ 414,876	+ 5.3	39,490	209.	
Appalachian Virginia	763,678	- 4,452	- 0.6	11,179	68.3	
Non-Appalachian Virginia	7,492,952	+ 419,328	+ 5.9	28,311	264.	
West Virginia (entire state)	1,851,420	+ 10,618	+ 0.6	24,038	77.	

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

**NEW YORK** PENNSYLVANIA оню VIRGINIA **VIRGINIA TENNESSEE NORTH CAROLINA** County Population, 2011-2015 U.S. POPULATION: 316.5 MILLION SOUTH **CAROLINA** APPALACHIAN POPULATION: 25.4 MILLION 1,000,000 people **GEORGIA** 100,000 people 50,000 people **MISSISSIPPI** 10,000 people **ALABAMA** 1,000 people

Figure 1.1: Population Distribution in the Appalachian Region, 2011-2015

Map Title: Population Distribution in the Appalachian Region, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Of the 316.5 million persons in the United States during the period from 2011-2015, 25.4 million lived in the Appalachian Region. Yet the population of the Region's 420 counties varied greatly. On one hand, two-thirds of the counties had populations of fewer than 50,000 people, and 126 counties had fewer than 20,000 residents. On the other hand, pockets of the Appalachian population lived in large and mid-sized metropolitan areas, including Pittsburgh, Birmingham, and the Atlanta suburbs. Allegheny County, Pennsylvania (where Pittsburgh is located) had 1.2 million residents. It is important to note that the Appalachian population has continued to grow; the most recent population estimates indicated that the Region had more than 25.5 million residents in 2015 (out of 321.4 million nationwide), compared to 25.2 million in the 2010 Census.

**NEW YORK** PENNSYLVANIA оню VIRGINIA **VIRGINIA TENNESSEE** NORTH **CAROLINA** Percent Change in Population, SOUTH 2006-2010 to 2011-2015 CAROLINA U.S. AVERAGE: +4.1 PERCENT APPALACHIAN AVERAGE: +1.7 PERCENT **GEORGIA** +4.1 percent or more +1.7 percent to +4 percent **MISSISSIPPI** +0.1 percent to +1.6 percent No change or decrease **ALABAMA** 

Figure 1.2: Population Change in the Appalachian Region, 2006-2010 to 2011-2015

Map Title: Population Change in the Appalachian Region, 2006-2010 to 2011-2015 Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

The Appalachian Region's population grew less than 2 percent between the 2006-2010 and 2011-2015 periods, less than half the national average. And demographic change was even slower in much of Appalachia—in fact, the Appalachian sections of Kentucky, New York, Ohio, Pennsylvania, and Virginia have actually lost population since 2006-2010. Those five states alone had 127 of the 223 Appalachian counties that lost residents between 2006-2010 and 2011-2015. On the other hand, 43 counties in Appalachia grew at or above the national rate between the two intervals. Nearly half of these counties were in Southern Appalachia, which was the only subregion where the rate of population growth exceeded the national average. Population growth was particularly high in the Appalachian parts of Georgia and South Carolina, with increases of 7 percent and 5.6 percent, respectively.

**NEW YORK** PENNSYLVANIA OHIO VIRGINIA **VIRGINIA TENNESSEE** NORTH CAROLINA Persons per Square Mile, SOUTH 2011-2015 **CAROLINA** U.S. AVG.: 89.6 PERSONS/SQ. MILE APPALACHIAN AVG.: 124.3 PERSONS/SQ. MILE **GEORGIA** 150 or more persons 89.6 persons to 149.9 persons 50 persons to 89.5 persons MISSISSIPPI Fewer than 50 persons **ALABAMA** Miles

Figure 1.3: Population per Square Mile of Land Area in the Appalachian Region, 2011-2015

Map Title: Population per Square Mile of Land Area in the Appalachian Region, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

While Appalachia's population density was noticeably greater than the United States as a whole over the 2011-2015 period, just two-fifths of the Region's counties had population concentrations at or above the national average. Most of the high-density counties were in metropolitan areas, both large (Pittsburgh, Birmingham, suburban Atlanta) and small (Winston-Salem, North Carolina; Knoxville, Tennessee).

# **CHAPTER 2: AGE**

Table 2.1: Population in the Appalachian Region by Age Group, 2011-2015

	Total		Percent of	Population		Median
Population by Age Group	Population, 2011-2015	Under Age 18	Ages 18-24	Ages 25-64	Ages 65 and over	Age (Years)
United States	316,515,021	23.3	9.9	52.7	14.1	37.6
Appalachian Region	25,417,532	21.8	9.7	52.2	16.3	40.5
Subregions						
Northern Appalachia	8,336,272	20.2	10.0	52.0	17.7	42.2
North Central Appalachia	2,425,882	21.4	9.6	52.5	16.5	40.9
Central Appalachia	1,900,772	21.8	8.8	53.0	16.4	41.2
South Central Appalachia	4,777,566	20.8	9.9	51.5	17.8	41.5
Southern Appalachia	7,977,040	24.2	9.6	52.4	13.8	37.9
County Types						
Large Metros (pop. 1 million +)	5,963,130	23.2	8.8	53.7	14.3	39.2
Small Metros (pop. <1 million)	10,733,709	21.3	10.4	51.9	16.3	40.2
Nonmetro, Adjacent to Large Metros	2,201,683	21.8	9.9	51.4	16.9	41.0
Nonmetro, Adjacent to Small Metros	3,981,497	21.1	9.0	51.6	18.4	42.5
Rural (nonmetro, not adj. to a metro)	2,537,513	21.5	9.9	51.3	17.2	41.1
Alabama	4,830,620	23.0	9.9	52.2	14.9	38.4
Appalachian Alabama	3,092,319	22.8	9.6	52.7	14.9	38.9
Non-Appalachian Alabama	1,738,301	23.4	10.5	51.2	14.9	37.6
Georgia	10,006,693	24.9	10.1	53.1	11.9	35.9
Appalachian Georgia	3,047,462	26.2	8.9	52.9	12.0	36.8
Non-Appalachian Georgia	6,959,231	24.3	10.7	53.1	11.9	35.6
Kentucky	4,397,353	23.1	9.7	52.8	14.4	38.5
Appalachian Kentucky	1,178,147	22.3	9.3	52.7	15.7	40.3
Non-Appalachian Kentucky	3,219,206	23.4	9.8	52.9	13.9	37.8
Maryland	5,930,538	22.7	9.5	54.4	13.3	38.2
Appalachian Maryland	252,632	20.8	9.7	52.8	16.8	41.1
Non-Appalachian Maryland	5,677,906	22.8	9.5	54.5	13.2	38.1
Mississippi	2,988,081	24.6	10.4	51.1	13.9	36.5
Appalachian Mississippi	628,965	23.9	11.1	49.9	15.1	37.6
Non-Appalachian Mississippi	2,359,116	24.8	10.2	51.4	13.6	36.4
New York	19,673,174	21.6	10.1	54.0	14.3	38.1
Appalachian New York	1,055,972	20.2	13.2	49.8	16.8	40.3
Non-Appalachian New York	18,617,202	21.7	9.9	54.2	14.2	38.1
North Carolina	9,845,333	23.2	9.9	52.6	14.2	38.0
Appalachian North Carolina	1,716,912	20.7	9.3	51.6	18.4	42.2
Non-Appalachian North Carolina	8,128,421	23.7	10.1	52.8	13.4	37.2
Ohio	11,575,977	22.9	9.5	52.4	15.1	39.2
Appalachian Ohio	2,023,656	22.2	9.0	52.0	16.8	41.3
Non-Appalachian Ohio	9,552,321	23.1	9.6	52.5	14.7	38.8
Pennsylvania	12,779,559	21.3	9.7	52.7	16.3	40.5
Appalachian Pennsylvania	5,770,892	19.8	9.8	52.4	17.9	42.5
Non-Appalachian Pennsylvania	7,008,667	22.5	9.7	52.8	15.0	38.9
South Carolina	4,777,576	22.6	10.2	52.0	15.2	38.6
Appalachian South Carolina	1,208,294	23.1	10.2	51.7	15.0	38.5
Non-Appalachian South Carolina	3,569,282	22.5	10.1	52.1	15.3	38.6
Tennessee	6,499,615	23.0	9.6	52.8	14.6	38.4
Appalachian Tennessee	2,827,183	21.3	9.4	52.0	17.3	41.3
Non-Appalachian Tennessee	3,672,432	24.3	9.8	53.4	12.5	36.4
Virginia	8,256,630	22.6	10.0	54.1	13.3	37.6
Appalachian Virginia	763,678	19.0	11.8	50.9	18.3	42.0
Non-Appalachian Virginia	7,492,952	22.9	9.8	54.4	12.8	37.3
West Virginia (entire state)	1,851,420	20.7	9.2	52.9	17.2	41.8

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

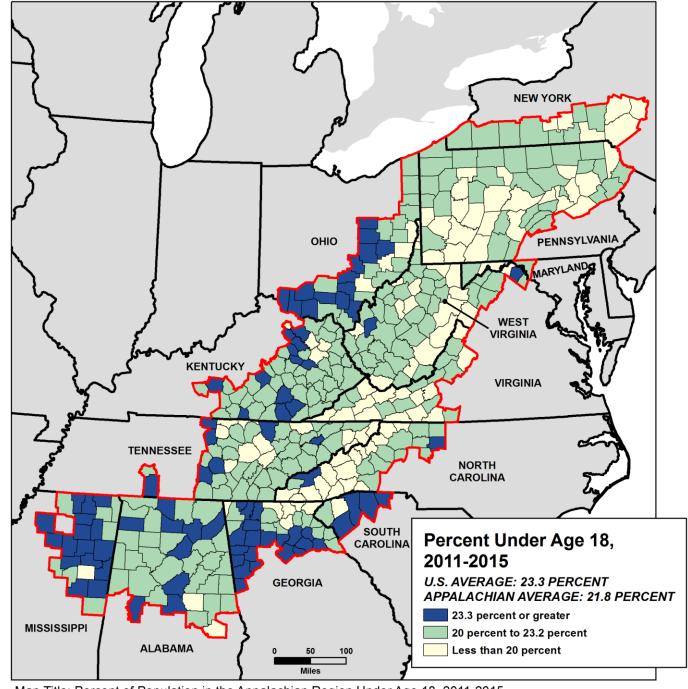


Figure 2.1: Percent of Population in the Appalachian Region Under Age 18, 2011-2015

Map Title: Percent of Population in the Appalachian Region Under Age 18, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Over the 2011-2015 period, the share of children and youth under age 18 in the Appalachian population was slightly below the national average of 23.3 percent. And the share was actually less than 20 percent in 107 of the Region's 420 counties, most of which were outside metropolitan areas, with concentrations in Pennsylvania, West Virginia, Virginia, and North Carolina. Yet in another 86 Appalachian counties, the share of children under age 18 matched or exceeded the national average. Most of these counties were in Southern Appalachia, with concentrations in Georgia, Mississippi, and South Carolina. Among the states, the Appalachian portions of Georgia and Mississippi were the only two in the Region where the under-18 percentage was greater than that of the nation as a whole—although the share in South Carolina was close, at 23.1 percent.

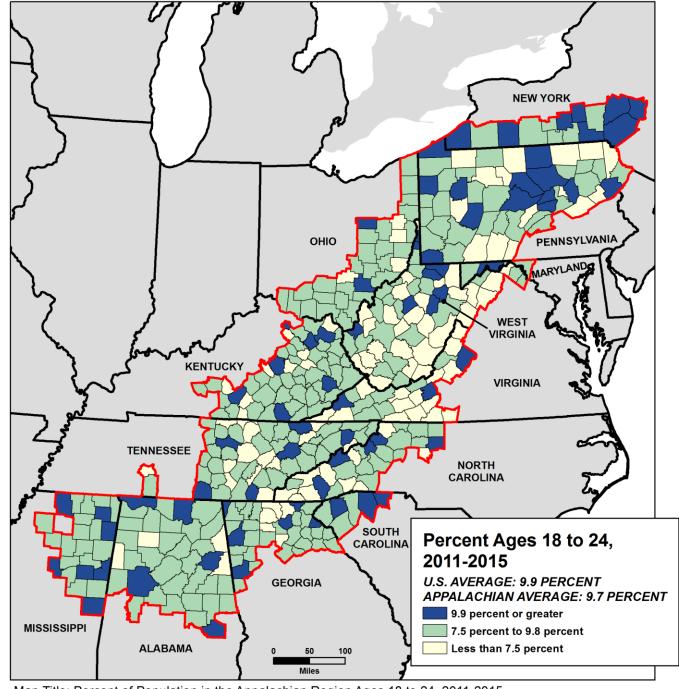


Figure 2.2: Percent of Population in the Appalachian Region Ages 18 to 24, 2011-2015

Map Title: Percent of Population in the Appalachian Region Ages 18 to 24, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Although the share of young adults (ages 18 to 24) in Appalachia roughly equaled the national average in the 2011-2015 period, there were great variations within the Region. For example, persons in this age group made up at least 15 percent of the population in 24 counties. Nearly all of these counties are home to colleges and universities such as Penn State University (Centre County, Pennsylvania); Ohio University (Athens County, Ohio); and Clemson University (Pickens County, South Carolina). In contrast, 18-to-24-year-olds made up less than 7.5 percent of the population in 103 Appalachian counties. Of the counties in this latter group, 74 were outside metropolitan areas and 26 were in the most rural counties—both of which suggest a possible lack of opportunities in these communities for youth making the transition to adulthood.

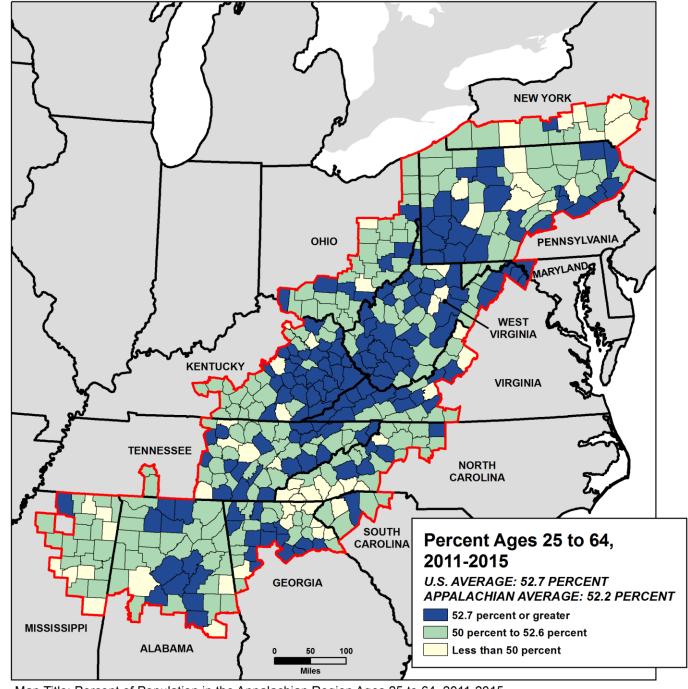


Figure 2.3: Percent of Population in the Appalachian Region Ages 25 to 64, 2011-2015

Map Title: Percent of Population in the Appalachian Region Ages 25 to 64, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In both the United States and Appalachia, adults in the prime working ages (ages 25 to 64) made up a slight majority of all residents in the 2011-2015 period. In 159 of the 420 Appalachian counties, the percentage of persons in this age group matched or exceeded the national average. But there were 58 counties in the Region (47 of which were outside metropolitan areas) where 25-to-64-year-olds made up less than half of the population. Many of these counties--such as Watauga County, North Carolina, home to Appalachian State University—house colleges and universities (and thus had a high share of their populations in the 18-to-24 age range.)

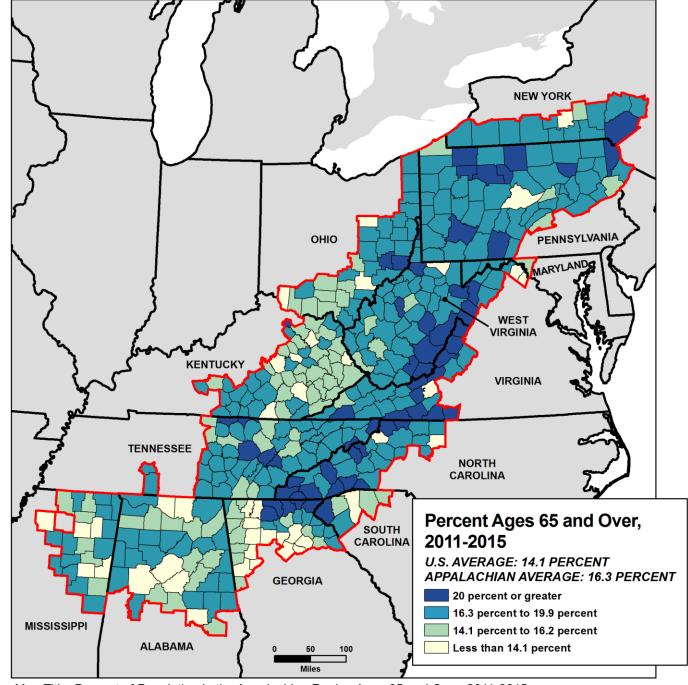


Figure 2.4: Percent of Population in the Appalachian Region Ages 65 and Over, 2011-2015

Map Title: Percent of Population in the Appalachian Region Ages 65 and Over, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

The share of residents ages 65 and over in the Appalachian Region exceeded the national average by two percentage points during the 2011-2015 period. Moreover, the percentage of persons in this age group matched or exceeded the U.S. share in 378 of the 420 Appalachian counties—and the overall Region share (16.3 percent) in 294 of them. In fact, older persons made up at least 20 percent of the population in 60 Appalachian counties, more than four-fifths of which were outside metropolitan areas. In contrast, most of the 42 Appalachian counties with older population shares below the national average were either in metro areas or home to colleges and universities. With the large baby boom cohorts moving into this age group, the share of residents ages 65 and over will continue to increase over the coming years in both Appalachia and the nation.

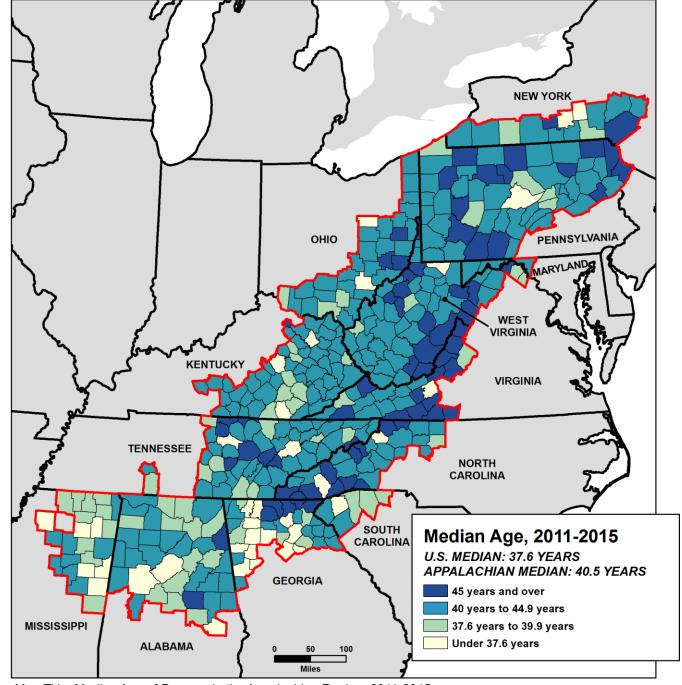


Figure 2.5: Median Age of Persons in the Appalachian Region, 2011-2015

Map Title: Median Age of Persons in the Appalachian Region, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

At 40.5 years, the median age of the Appalachian population was nearly three years older than that of the United States as a whole during the 2011-2015 period. Indeed, the median age of the population (the point at which half the population is older and half is younger) was at least 40 years in three-fourths of the Region's counties. And in 75 counties—58 of which were outside metro areas—the median age was at least 45 years. Of the 37 counties with populations whose median age was younger than the national median, 23 were in Southern Appalachia—the only subregion where the overall age structure roughly resembled that of the nation. (Appalachian Georgia alone had 13 of these counties.) As the U.S. and Appalachian populations grow older, median age will almost certainly continue to rise in most of the Region's counties—with the possible exception of counties where a college or university is a major presence (such as Tuscaloosa County, Alabama, home to the University of Alabama).

Table 2.2: Percentage Point Change in the Share of the Population in the Appalachian Region, by Age Group, 2006-2010 to 2011-2015

	Percenta	Change in			
Population by Age Group	Under Age 18	Ages 18-24	Ages 25-64	Ages 65 and over	Median Age (Years)
United States	- 1.1	+ 0.0	- 0.3	+ 1.4	+ 0.7
Appalachian Region	- 0.9	+ 0.1	- 0.6	+ 1.5	+ 1.1
Subregions					
Northern Appalachia	- 1.1	+ 0.1	- 0.1	+ 1.1	+ 1.0
North Central Appalachia	- 0.7	+ 0.0	- 0.8	+ 1.5	+ 1.0
Central Appalachia	- 0.8	+ 0.1	- 1.0	+ 1.7	+ 1.3
South Central Appalachia	- 0.9	+ 0.2	- 1.3	+ 2.0	+ 1.2
Southern Appalachia	- 1.0	+ 0.2	- 0.8	+ 1.6	+ 1.2
County Types					
Large Metros (pop. 1 million +)	- 0.9	+ 0.1	- 0.4	+ 1.2	+ 1.0
Small Metros (pop. <1 million)	- 0.9	+ 0.1	- 0.7	+ 1.5	+ 1.0
Nonmetro, Adjacent to Large Metros	- 1.2	+ 0.0	- 0.5	+ 1.7	+ 1.4
Nonmetro, Adjacent to Small Metros	- 1.0	+ 0.3	- 1.1	+ 1.9	+ 1.3
Rural (nonmetro, not adj. to a metro)	- 1.0	+ 0.1	- 1.0	+ 1.7	+ 1.2
Alabama	- 1.0	- 0.1	- 0.3	+ 1.4	+ 0.9
Appalachian Alabama	- 0.9	- 0.1	- 0.4	+ 1.4	+ 1.1
Non-Appalachian Alabama	- 1.2	- 0.1	- 0.2	+ 1.5	+ 0.7
Georgia	- 1.1	+ 0.0	- 0.6	+ 1.6	+ 0.9
Appalachian Georgia	- 1.1	+ 0.3	- 1.2	+ 2.0	+ 1.4
Non-Appalachian Georgia	- 1.2	+ 0.0	- 0.4	+ 1.5	+ 0.8
Kentucky	- 0.7	+ 0.1	- 0.8	+ 1.3	+ 0.8
Appalachian Kentucky	- 0.8	+ 0.1	- 0.9	+ 1.6	+ 1.3
Non-Appalachian Kentucky	- 0.7	+ 0.1	- 0.6	+ 1.2	+ 0.6
Maryland	- 1.2	- 0.1	- 0.2	+ 1.4	+ 0.6
Appalachian Maryland	- 0.9	+ 0.0	- 0.3	+ 1.3	+ 1.1
Non-Appalachian Maryland	- 1.2	- 0.1	- 0.2	+ 1.5	+ 0.7
Mississippi	- 1.1	- 0.1	- 0.1	+ 1.3	+ 0.7
Appalachian Mississippi	- 1.1	+ 0.4	- 0.6	+ 1.3	+ 0.9
Non-Appalachian Mississippi	- 1.1	- 0.2	+ 0.0	+ 1.4	+ 0.9
New York	- 1.2	+ 0.1	+ 0.1	+ 1.0	+ 0.4
Appalachian New York	- 1.4	+ 0.5	- 0.6	+ 1.5	+ 0.9
Non-Appalachian New York	- 1.2	+ 0.0	+ 0.1	+ 1.0	+ 0.5
North Carolina	- 0.9	+ 0.1	- 0.8	+ 1.6	+ 0.9
Appalachian North Carolina	- 1.1	+ 0.2	- 1.3	+ 2.1	+ 1.3
Non-Appalachian North Carolina	- 1.0	+ 0.1	- 0.8	+ 1.6	+ 0.9
Ohio	- 1.1	+ 0.0	- 0.3	+ 1.3	+ 0.9
Appalachian Ohio	- 1.2	+ 0.0	- 0.4	+ 1.5	+ 1.4
Non-Appalachian Ohio	- 1.1	+ 0.0	- 0.3	+ 1.3	+ 0.9
Pennsylvania	- 1.1	- 0.1	+ 0.1	+ 1.0	+ 0.7
Appalachian Pennsylvania	- 1.2	+ 0.0	+ 0.0	+ 1.0	+ 1.0
Non-Appalachian Pennsylvania	- 1.1	+ 0.0	+ 0.0	+ 1.1	+ 0.7
South Carolina	- 1.1	+ 0.0	- 0.9	+ 2.0	+ 1.2
Appalachian South Carolina	- 0.8	+ 0.2	- 1.0	+ 1.6	+ 0.9
Non-Appalachian South Carolina	- 1.1	- 0.2	- 0.8	+ 2.2	+ 1.2
Tennessee	- 0.9	+ 0.1	- 0.8	+ 1.5	+ 0.8
Appalachian Tennessee	- 0.9	+ 0.2	- 1.3	+ 1.9	+ 1.3
Non-Appalachian Tennessee	- 0.9	+ 0.1	- 0.4	+ 1.2	+ 0.7
Virginia	- 0.9	- 0.1	- 0.5	+ 1.5	+ 0.4
Appalachian Virginia	- 0.9	+ 0.1	- 1.1	+ 1.9	+ 1.1
Non-Appalachian Virginia	- 1.0	- 0.1	- 0.4	+ 1.4	+ 0.5
West Virginia (entire state)	- 0.5	+ 0.0	- 1.0	+ 1.4	+ 0.7

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

#### TRENDS IN AGE

- Like the United States as a whole, Appalachia's population has gotten older between the 2006-2010 and 2011-2015 periods (see Table 2.2). And it's been aging more noticeably than the national population in that time: The median age of the Region's population (the point at which half the population is older and half is younger) has risen by more than a year between these two periods to 40.5 years. By comparison, the U.S. median age has risen by just less than a year.
- Some parts of the Appalachian Region are aging faster than others. For example, the median age rose 1.4 years in Appalachian Ohio and 1.3 years in Appalachian North Carolina between 2006-2010 and 2011-2015, to 41.3 years and 42.2 years, respectively. And the median age in Appalachian counties outside metropolitan areas has risen slightly faster than in the Region's metropolitan counties. Yet among all Appalachian subregions and county types, as well as in the Appalachian portions of nearly every state in the Region, the median age is increasing faster than the national average.
- In both the United States and Appalachia, the aging of the population has come largely at the expense of younger age groups. For example, the share of the population under age 18 is about one percentage point lower in 2011-2015 than it was in 2006-2010. Similarly, the share ages 25 to 64 has fallen by less than half a percentage point in Appalachia, particularly as older members of the baby boom cohorts move into the "65 and over" age category. Between the two periods, the share of residents in the older age group increased 1.5 percentage points in the Region.
- While much of Appalachia is "aging in place" (particularly with the aging of the baby boom cohorts), the migration of some older residents to retirement destinations is a factor behind the aging of some parts of the Region. For example, several Appalachian counties where the median age is at least 45 years have been designated as "retirement" counties by the Economic Research Service of the U.S. Department of Agriculture.

# **CHAPTER 3: RACE AND HISPANIC ORIGIN**

Table 3.1: Population in the Appalachian Region by Race and Hispanic Origin, 2011-2015

			Percent of Population					
Population by Race and Hispanic Origin	Total	White		ority				
Topanio Origin	Population, 2011-2015	Alone, Not Hispanic	Total	Black Alone, Not Hispanic	Hispanic or Latino	Other, Not Hispanic		
United States	316,515,021	62.3	37.7	12.3	17.1	8.3		
Appalachian Region	25,417,532	82.5	17.5	9.4	4.6	3.5		
Subregions								
Northern Appalachia	8,336,272	88.7	11.3	5.2	2.8	3.3		
North Central Appalachia	2,425,882	92.8	7.2	2.9	1.4	2.9		
Central Appalachia	1,900,772	95.0	5.0	1.9	1.4	1.7		
South Central Appalachia	4,777,566	84.8	15.2	7.0	4.9	3.3		
Southern Appalachia	7,977,040	68.7	31.3	18.9	7.9	4.4		
County Types								
Large Metros (pop. 1 million +)	5,963,130	73.6	26.4	15.1	6.1	5.2		
Small Metros (pop. <1 million)	10,733,709	82.1	17.9	9.3	5.1	3.5		
Nonmetro, Adjacent to Large Metros	2,201,683	88.6	11.4	5.2	3.5	2.7		
Nonmetro, Adjacent to Small Metros	3,981,497	89.9	10.1	4.5	3.2	2.4		
Rural (nonmetro, not adj. to a metro)	2,537,513	88.6	11.4	7.6	1.9	1.9		
Alabama	4,830,620	66.3	33.7	26.3	4.0	3.4		
Appalachian Alabama	3,092,319	70.3	29.7	22.0	4.5	3.2		
Non-Appalachian Alabama	1,738,301	59.3	40.7	34.0	3.1	3.6		
Georgia	10,006,693	54.6	45.4	30.5	9.1	5.8		
Appalachian Georgia	3,047,462	66.1	33.9	14.2	13.2	6.5		
Non-Appalachian Georgia	6,959,231	49.5	50.5	37.7	7.4	5.4		
Kentucky	4,397,353	85.6	14.4	7.8	3.3	3.4		
Appalachian Kentucky	1,178,147	95.0	5.0	1.8	1.4	1.7		
Non-Appalachian Kentucky	3,219,206	82.1	17.9	10.0	3.9	4.0		
Maryland	5,930,538	53.0	47.0	29.1	9.0	8.9		
Appalachian Maryland	252,632	85.1	14.9	8.1	3.0	3.9		
Non-Appalachian Maryland	5,677,906	51.6	48.4	30.0	9.3	9.2		
Mississippi	2,988,081	57.4	42.6	37.2	2.9	2.5		
Appalachian Mississippi	628,965	64.1	35.9	31.6	2.5	1.8		
Non-Appalachian Mississippi	2,359,116	55.6	44.4	38.7	3.0	2.7		
New York	19,673,174	56.8	43.2	14.4	18.4	10.4		
Appalachian New York	1,055,972	89.1	10.9	2.7	3.4	4.8		
Non-Appalachian New York	18,617,202	54.9	45.1	15.1	19.3	10.7		
North Carolina	9,845,333	64.2	35.8	21.2	8.8	5.8		
Appalachian North Carolina	1,716,912	80.5	19.5	8.7	7.2	3.6		
Non-Appalachian North Carolina	8,128,421	60.8	39.2	23.8	9.2	6.2		
Ohio	11,575,977	80.3	19.7	12.0	3.4	4.3		
Appalachian Ohio	2,023,656	91.4	8.6	4.2	1.8	2.6		
Non-Appalachian Ohio	9,552,321	77.9	22.1	13.7	3.7	4.7		
Pennsylvania	12,779,559	78.1	21.9	10.5	6.4	5.0		
Appalachian Pennsylvania	5,770,892	88.6	11.4	5.4	2.8	3.2		
Non-Appalachian Pennsylvania	7,008,667	69.5	30.5	14.8	9.3	6.4		
South Carolina	4,777,576	63.9	36.1	27.3	5.3	3.5		
Appalachian South Carolina	1,208,294	73.6	26.4	16.6	6.2	3.5		
Non-Appalachian South Carolina	3,569,282	60.6	39.4	30.9	5.0	3.5		
Tennessee	6,499,615	74.7	25.3	16.7	4.9	3.7		
Appalachian Tennessee	2,827,183	87.9	12.1	5.4	3.6	3.1		
Non-Appalachian Tennessee	3,672,432	64.6	35.4	25.4	5.9	4.1		
Virginia	8,256,630	63.4	36.6	18.9	8.6	9.1		
Appalachian Virginia	763,678	89.5	10.5	5.5	2.2	2.8		
Non-Appalachian Virginia	7,492,952	60.8	39.2	20.3	9.2	9.7		
West Virginia (entire state)	1,851,420	92.5	7.5	3.3	1.4	2.8		

Note: "Other" includes these racial groups: (a) American Indian and Alaska Native alone; (b) Asian alone; (c) Native Hawaiian and Other Pacific Islander alone; (d) Some other race alone; and (e) Two or more races.

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

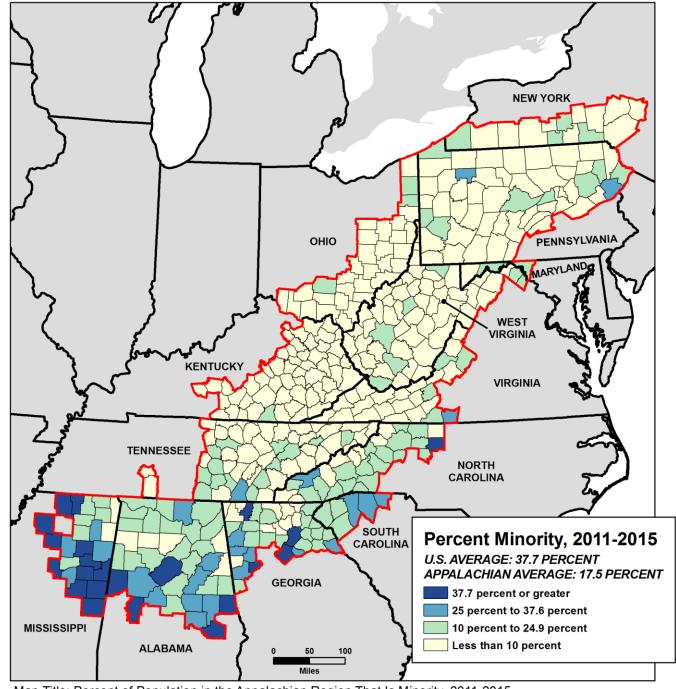


Figure 3.1: Percent of Population in the Appalachian Region That Is Minority, 2011-2015

Map Title: Percent of Population in the Appalachian Region That Is Minority, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

The Appalachian Region is significantly less racially and ethnically diverse than the United States as a whole, and most parts of the Region have remained far below the national average in their minority populations. In almost two-thirds of Appalachian counties, minorities (defined as anyone who identifies with a racial or ethnic group *other than* "white alone, not Hispanic") made up less than 10 percent of the population during the 2011-2015 period. There were just 22 counties—all but one in Southern Appalachia and more than half in Mississippi alone—where minorities' share of the population matched or exceeded the national average of nearly 38 percent.

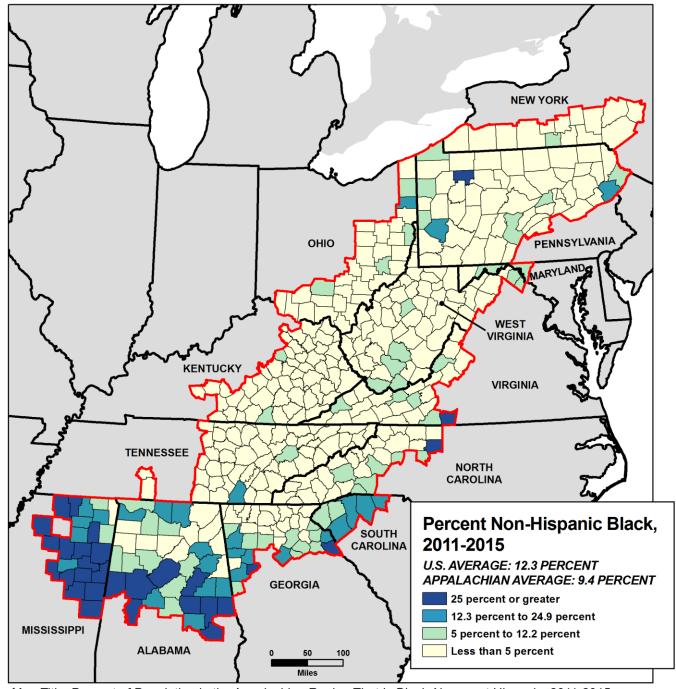


Figure 3.2: Percent of Population in the Appalachian Region That Is Black Alone, not Hispanic, 2011-2015

Map Title: Percent of Population in the Appalachian Region That Is Black Alone, not Hispanic, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

While non-Hispanic African Americans have remained the largest single minority group in Appalachia during the 2011-2015 period, their share of the Region's total population was still lower than in the United States as a whole. Within the Region, the largest proportions were in Southern Appalachia—the only subregion where blacks' share of the population exceeded the national average. Southern Appalachia also had 51 of the Region's 58 counties where the black share of the population matched or surpassed that of the nation—as well as 27 of the 30 where at least one in four residents was African American. At the other end of the spectrum, persons who were "black alone, not Hispanic" accounted for less than 5 percent of the residents in nearly three-fourths of Appalachian counties.

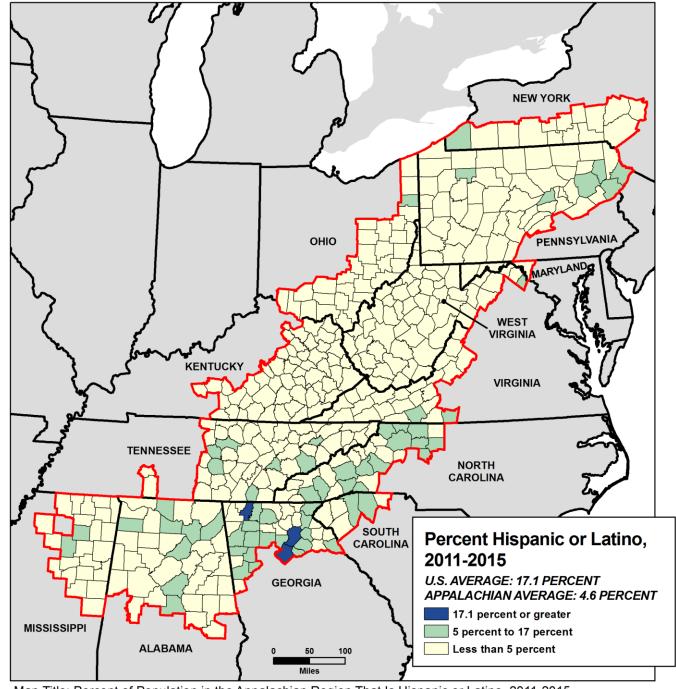


Figure 3.3: Percent of Population in the Appalachian Region That Is Hispanic or Latino, 2011-2015

Map Title: Percent of Population in the Appalachian Region That Is Hispanic or Latino, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Although Hispanics are now the United States' largest minority group, they made up only one in 25 residents in the Appalachian Region during the 2011-2015 period. The county patterns reflect this fact, as Hispanics were at least 5 percent of the population in just 64 of Appalachia's 420 counties, all but nine of which were in Southern and South Central Appalachia. Moreover, just three Appalachian counties (Gwinnett, Hall, and Whitfield—all in Georgia) had Latino population shares that matched or exceeded the national average.

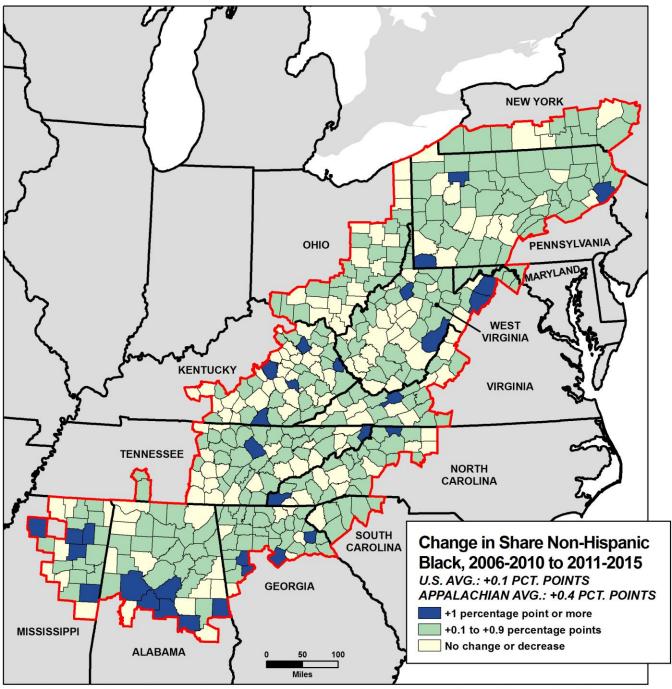
Table 3.2: Percentage Point Change in the Share of the Population in the Appalachian Region, by Race and Hispanic Origin, 2006-2010 to 2011-2015

	Percentage Point Change in Share of Population Minority							
Population by Race and Hispanic Origin	White Alone, Not Hispanic	Total	Black Alone, Not Hispanic	Hispanic or Latino	Other, Not Hispanic			
United States	- 2.4	+ 2.4	+ 0.1	+ 1.4	+ 0.9			
Appalachian Region	- 1.8	+ 1.8	+ 0.4	+ 0.8	+ 0.6			
Subregions								
Northern Appalachia	- 1.4	+ 1.4	+ 0.2	+ 0.6	+ 0.6			
North Central Appalachia	- 0.8	+ 0.8	+ 0.1	+ 0.2	+ 0.5			
Central Appalachia	- 0.7	+ 0.7	+ 0.1	+ 0.4	+ 0.2			
South Central Appalachia	- 1.3	+ 1.3	+ 0.1	+ 0.7	+ 0.5			
Southern Appalachia	- 2.3	+ 2.3	+ 0.6	+ 0.9	+ 0.6			
County Types								
Large Metros (pop. 1 million +)	- 2.6	+ 2.6	+ 0.8	+ 0.9	+ 0.9			
Small Metros (pop. <1 million)	- 1.7	+ 1.7	+ 0.3	+ 0.8	+ 0.5			
Nonmetro, Adjacent to Large Metros	- 1.1	+ 1.1	+ 0.2	+ 0.5	+ 0.5			
Nonmetro, Adjacent to Small Metros	- 0.9	+ 0.9	+ 0.1	+ 0.5	+ 0.3			
Rural (nonmetro, not adj. to a metro)	- 1.0	+ 1.0	+ 0.2	+ 0.4	+ 0.4			
Alabama	- 1.4	+ 1.4	+ 0.3	+ 0.6	+ 0.5			
Appalachian Alabama	- 1.5	+ 1.5	+ 0.4	+ 0.6	+ 0.5			
Non-Appalachian Alabama	- 1.0	+ 1.0	+ 0.1	+ 0.5	+ 0.4			
Georgia	- 2.2	+ 2.2	+ 0.5	+ 0.8	+ 1.0			
Appalachian Georgia	- 3.6	+ 3.6	+ 1.5	+ 1.2	+ 0.9			
Non-Appalachian Georgia	- 1.8	+ 1.8	+ 0.2	+ 0.7	+ 0.9			
Kentucky	- 1.3	+ 1.3	+ 0.2	+ 0.6	+ 0.7			
Appalachian Kentucky	- 0.7	+ 0.7	+ 0.1	+ 0.3	+ 0.2			
Non-Appalachian Kentucky	- 1.5	+ 1.5	+ 0.1	+ 0.5	+ 0.8			
Maryland	- 2.8	+ 2.8	+ 0.2	+ 1.5	+ 1.1			
Appalachian Maryland	- 2.2	+ 2.2	+ 0.6	+ 0.6	+ 1.1			
Non-Appalachian Maryland	- 2.8	+ 2.8	+ 0.1	+ 1.5	+ 1.2			
Mississippi	- 1.1	+ 1.1	+ 0.3	+ 0.5	+ 0.3			
Appalachian Mississippi	- 1.1	+ 1.1	+ 0.3	+ 0.5	+ 0.3			
Non-Appalachian Mississippi	- 1.1	+ 1.1	+ 0.3	+ 0.5	+ 0.3			
New York	- 2.4	+ 2.4	- 0.1	+ 1.3	+ 1.2			
Appalachian New York	- 1.5	+ 1.5	+ 0.2	+ 0.5	+ 0.7			
Non-Appalachian New York	- 2.4	+ 2.4	- 0.1	+ 1.4	+ 1.1			
North Carolina	- 1.9	+ 1.9	+ 0.0	+ 1.0	+ 0.9			
Appalachian North Carolina	- 1.4	+ 1.4	+ 0.1	+ 0.9	+ 0.5			
Non-Appalachian North Carolina	- 1.8	+ 1.8	- 0.1	+ 1.1	+ 0.9			
Ohio	- 1.3	+ 1.3	+ 0.0	+ 0.5	+ 0.8			
Appalachian Ohio	- 0.6	+ 0.6	- 0.1	+ 0.3	+ 0.5			
Non-Appalachian Ohio	- 1.5	+ 1.5	+ 0.1	+ 0.5	+ 0.9			
Pennsylvania	- 2.2	+ 2.2	+ 0.1	+ 1.2	+ 0.8			
Appalachian Pennsylvania	- 1.5	+ 1.5	+ 0.2	+ 0.6	+ 0.6			
Non-Appalachian Pennsylvania	- 2.5	+ 2.5	+ 0.0	+ 1.5	+ 0.9			
South Carolina	- 0.6	+ 0.6	- 0.7	+ 0.7	+ 0.6			
Appalachian South Carolina	- 1.6	+ 1.6	+ 0.2	+ 0.9	+ 0.4			
Non-Appalachian South Carolina	- 0.2	+ 0.2	- 1.0	+ 0.6	+ 0.6			
Tennessee	- 1.5	+ 1.5	+ 0.2	+ 0.7	+ 0.6			
Appalachian Tennessee	- 1.3	+ 1.3	+ 0.1	+ 0.6	+ 0.6			
Non-Appalachian Tennessee	- 1.4	+ 1.4	+ 0.0	+ 0.8	+ 0.6			
Virginia	- 2.3	+ 2.3	- 0.4	+ 1.3	+ 1.4			
Appalachian Virginia	- 1.2	+ 1.2	+ 0.1	+ 0.5	+ 0.6			
Non-Appalachian Virginia	- 2.2	+ 2.2	- 0.5	+ 1.3	+ 1.4			
West Virginia (entire state)	- 0.9	+ 0.9	+ 0.1	+ 0.3	+ 0.5			

Note: "Other" includes these racial groups: (a) American Indian and Alaska Native alone; (b) Asian alone; (c) Native Hawaiian and Other Pacific Islander alone; (d) Some other race alone; and (e) Two or more races.

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Figure 3.4: Percentage Point Change in the Share of the Population in the Appalachian Region That Is Black Alone, not Hispanic, 2006-2010 to 2011-2015



Map Title: Percentage Point Change in the Share of the Population in the Appalachian Region That Is Black Alone, not Hispanic, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Although African Americans' share of the U.S. population barely budged between the 2006-2010 and 2011-2015 periods, their share of the Appalachian population rose nearly half a percentage point, from 9 percent to 9.4 percent. And there were 32 counties—with both large and small African American concentrations—where blacks' share of the population increased by at least one percentage point. Yet in about one-third of Appalachia's 420 counties, the African American share of the population has either stayed the same or decreased.

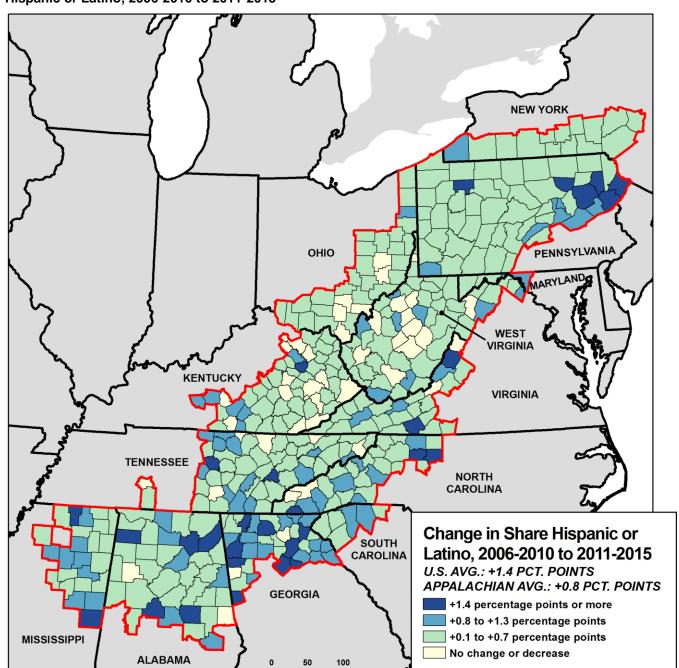


Figure 3.5: Percentage Point Change in the Share of the Population in the Appalachian Region That Is Hispanic or Latino, 2006-2010 to 2011-2015

Map Title: Percentage Point Change in the Share of the Population in the Appalachian Region That Is Hispanic or Latino, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Miles

The Hispanic/Latino share of the Appalachian population rose by almost a full percentage point between 2006-2010 and 2011-2015—although this increase was barely more than half the national average between the two periods. Still, there were 30 counties (14 of which were in either Georgia or Alabama) where the Hispanic share of the population grew at or above the national rate. Opportunities in industries such as poultry processing (in DeKalb and Franklin counties in Alabama) and construction (in the counties surrounding Atlanta)—as well as in creating small businesses—have been cited as possible factors fueling this growth.

#### TRENDS IN RACE AND HISPANIC ORIGIN

- The Appalachian Region has become more racially and ethnically diverse since 2006-2010. Between that period and 2011-2015, the share of the population that is minority (defined as anyone who identifies with a racial or ethnic group *other than* "white alone, not Hispanic") has risen almost two percentage points to 17.5 percent (see Tables 3.1 and 3.2). The pace of the increased diversity, however, is not as great as that of the nation as a whole, where the increase was nearly two and a half percentage points across the two periods.
- Within the Region, the greatest increase in racial diversity is occurring in Southern Appalachia and counties that are part of large metropolitan areas (1 million population or more). Since the 2006-2010 period, minorities' share of the population in those two areas has risen more than two percentage points. And Appalachian Georgia has grown even faster: The minority share of the population has increased nearly four percentage points since 2006-2010. Not surprisingly, these three areas have minority concentrations in 2011-2015 that come close to the national minority share of 38 percent (31 percent for Southern Appalachia, 26 percent for counties in large metros, and 34 percent for Appalachian Georgia).
- Although African Americans comprise the largest minority group in Appalachia, Hispanics have fueled much (if not most) of the minority increase. The Hispanic/Latino share of the Appalachian population rose almost a full percentage point between 2006-2010 and 2011-2015—twice the increase for the Region's African American share. The increase in the Latino population may be associated with employment opportunities in such industries as poultry processing and construction, as well as in the creation of small businesses. As with the overall minority population, Southern Appalachia, large metropolitan areas, and Appalachian Georgia had the greatest increases in both the black and Latino shares of the total population.

# **CHAPTER 4: HOUSING OCCUPANCY AND TENURE**

Table 4.1: Occupancy and Tenure of Housing Units in the Appalachian Region, 2011-2015

Housing Occupancy and Tenure	Total Number of Housing		Percent Housin		Percent of Occupied Housing Units	
riousing Occupancy and rendre	Units			Vacant	Owner- Occupied	Renter- Occupied
United States	133,351,840	116,926,305	87.7	12.3	63.9	36.1
Appalachian Region	11,590,695	9,884,708	85.3	14.7	70.5	29.5
Subregions						
Northern Appalachia	3,922,927	3,349,857	85.4	14.6	70.7	29.3
North Central Appalachia	1,119,097	949,650	84.9	15.1	72.0	28.0
Central Appalachia	882,747	743,518	84.2	15.8	72.4	27.6
South Central Appalachia	2,278,451	1,914,576	84.0	16.0	69.2	30.8
Southern Appalachia	3,387,473	2,927,107	86.4	13.6	70.0	30.0
County Types						
Large Metros (pop. 1 million +)	2,551,476	2,271,067	89.0	11.0	70.4	29.6
Small Metros (pop. <1 million)	4,813,137	4,203,653	87.3	12.7	68.9	31.1
Nonmetro, Adjacent to Large Metros	1,025,677	853,125	83.2	16.8	71.5	28.5
Nonmetro, Adjacent to Small Metros	1,950,205	1,567,988	80.4	19.6	73.1	26.9
Rural (nonmetro, not adj. to a metro)	1,250,200	988,875	79.1	20.9	72.4	27.6
Alabama	2,199,329	1,848,325	84.0	16.0	68.7	31.3
Appalachian Alabama	1,393,760	1,188,743	85.3	14.7	70.2	29.8
Non-Appalachian Alabama	805,569	659,582	81.9	18.1	66.0	34.0
Georgia	4,133,065	3,574,362	86.5	13.5	63.3	36.7
Appalachian Georgia	1,190,243	1,041,096	87.5	12.5	70.4	29.6
Non-Appalachian Georgia	2,942,822	2,533,266	86.1	13.9	60.4	39.6
Kentucky	1,944,495	1,708,499	87.9	12.1	67.2	32.8
Appalachian Kentucky	539,625	457,587	84.8	15.2	70.9	29.1
Non-Appalachian Kentucky	1,404,870	1,250,912	89.0	11.0	65.9	34.1
Maryland	2,410,256	2,166,389	89.9	10.1	66.8	33.2
Appalachian Maryland	113,395	96,254	84.9	15.1	66.8	33.2
Non-Appalachian Maryland	2,296,861	2,070,135	90.1	9.9	66.8	33.2
Mississippi	1,289,704	1,096,593	85.0	15.0	68.4	31.6
Appalachian Mississippi	280,130	237,766	84.9	15.1	70.6	29.4
Non-Appalachian Mississippi	1,009,574	858,827	85.1	14.9	67.8	32.2
New York	8,171,725	7,262,279	88.9	11.1	53.6	46.4
Appalachian New York	509,072	417,724	82.1	17.9	69.1	30.9
Non-Appalachian New York	7,662,653	6,844,555	89.3	10.7	52.7	47.3
North Carolina	4,417,210	3,775,581	85.5	14.5	65.1	34.9
Appalachian North Carolina	863,310	690,373	80.0	20.0	69.3	30.7
Non-Appalachian North Carolina	3,553,900	3,085,208	86.8	13.2	64.2	35.8
Ohio	5,140,902	4,585,084		10.8	66.3	33.7
Appalachian Ohio	902,362	792,442	87.8	12.2	71.3	28.7
Non-Appalachian Ohio	4,238,540	3,792,642	89.5	10.5	65.3	34.7
Pennsylvania	5,585,611	4,958,859	88.8	11.2	69.2	30.8
Appalachian Pennsylvania	2,724,802	2,328,695	85.5	14.5	71.1	28.9
Non-Appalachian Pennsylvania	2,860,809	2,630,164	91.9	8.1	67.5	32.5
South Carolina	2,174,319	1,815,094	83.5	16.5	68.6	31.4
Appalachian South Carolina	523,340	459,502	87.8	12.2	68.5	31.5
Non-Appalachian South Carolina	1,650,979	1,355,592	82.1	17.9	68.6	31.4
Tennessee	2,854,542	2,504,556	87.7	12.3	66.8	33.2
Appalachian Tennessee	1,300,994	1,127,131	86.6	13.4	69.6	30.4
Non-Appalachian Tennessee	1,553,548	1,377,425	88.7	11.3	64.4	35.6
Virginia	3,423,291	3,062,783	89.5	10.5	66.2	33.8
Appalachian Virginia	365,678	306,505	83.8	16.2	71.1	28.9
Non-Appalachian Virginia	3,057,613	2,756,278	90.1	9.9	65.6	34.4
West Virginia (entire state)	883,984	740,890	83.8	16.2	72.5	27.5

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

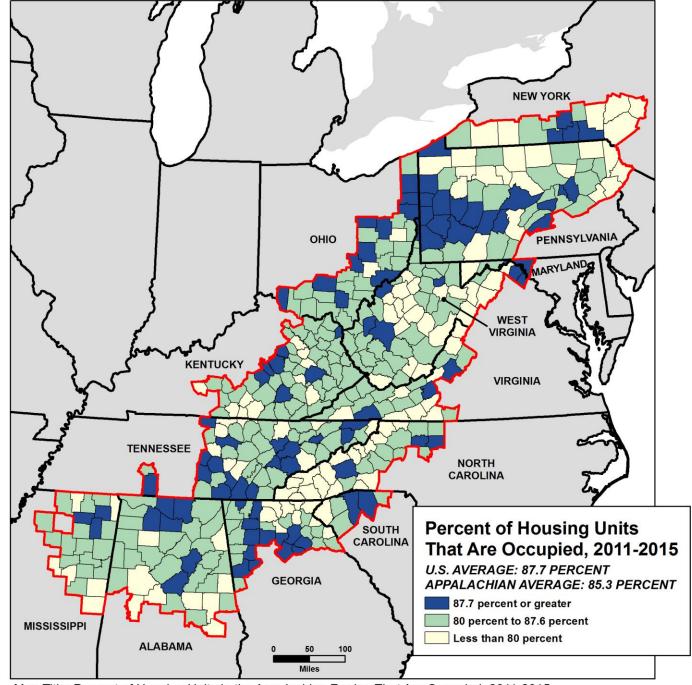


Figure 4.1: Percent of Housing Units in the Appalachian Region That Are Occupied, 2011-2015

Map Title: Percent of Housing Units in the Appalachian Region That Are Occupied, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Although the home occupancy rate during the 2011-2015 period was slightly lower in Appalachia than in the United States as a whole, there were 95 counties in the Region that had occupancy rates matching or exceeding the national average. And while they were scattered throughout the Region, 70 of these counties were in metropolitan areas, such as Pittsburgh, the Atlanta and Birmingham suburbs, and Winston-Salem, North Carolina. Conversely, less than four-fifths of housing units were occupied in 118 Appalachian counties—all but 19 of which lay outside metropolitan areas.

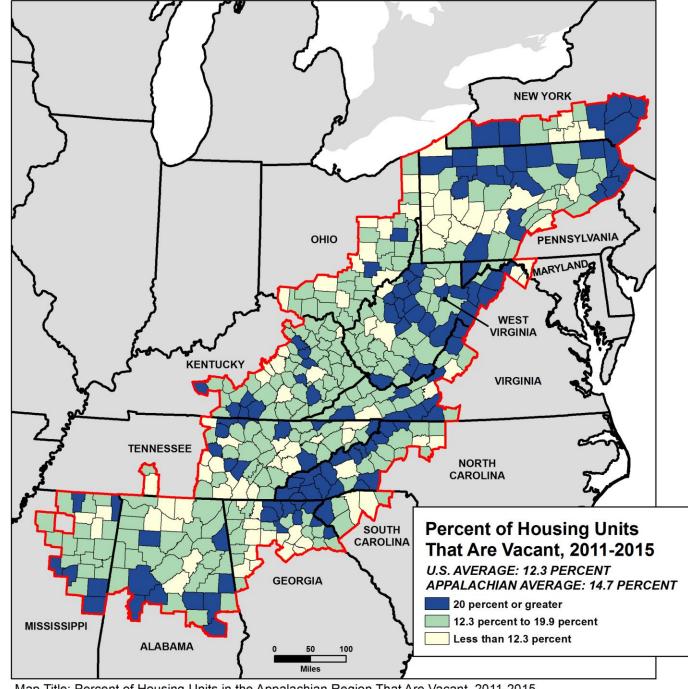


Figure 4.2: Percent of Housing Units in the Appalachian Region That Are Vacant, 2011-2015

Map Title: Percent of Housing Units in the Appalachian Region That Are Vacant, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

One in seven housing units in Appalachia were vacant during the 2011-2015 period, compared to one in eight for the nation as a whole. Vacancy rates varied within the Region, however. While 119 of the 420 Appalachian counties (100 of which were outside metropolitan areas) had vacancy rates at or above 20 percent, another 94 counties (mostly in metro areas) had rates below the national average. It is important to note that in 160 of the 326 Appalachian counties with vacancy rates of 12.3 percent or more, at least one-third of the vacant units were designated for seasonal or occasional use—suggesting significant recreational, resort, or retirement activity in the community. Examples of such areas include the Great Smoky Mountains along the North Carolina-Tennessee border, the Greenbrier resort in West Virginia (Greenbrier County), and the Pocono Mountains in northeastern Pennsylvania.

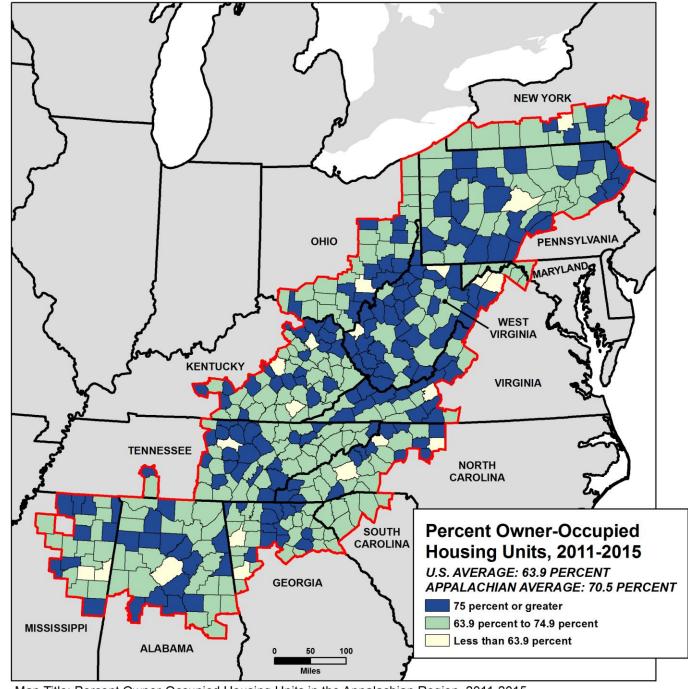


Figure 4.3: Percent Owner-Occupied Housing Units in the Appalachian Region, 2011-2015

Map Title: Percent Owner-Occupied Housing Units in the Appalachian Region, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Homeownership was more common in the Appalachian Region than in the rest of the country in the 2011-2015 period. In all but 20 counties, the share of owner-occupied housing units matched or exceeded the national average. Indeed, the homeownership rate was at least 75 percent in 177 of Appalachia's 420 counties, scattered throughout the Region. It is important to note that in some areas, the high homeownership rates might be related to low levels of economic and residential mobility, as well as the older age structure of the Appalachian population.

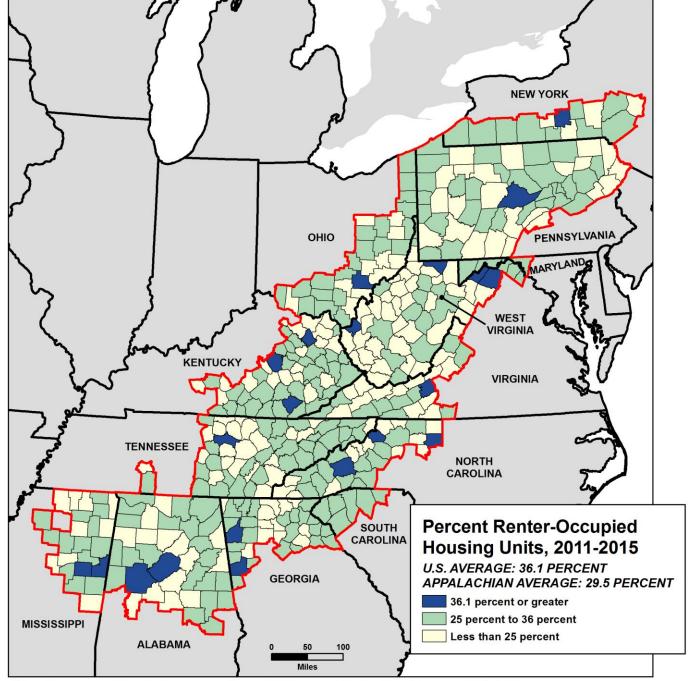


Figure 4.4: Percent Renter-Occupied Housing Units in the Appalachian Region, 2011-2015

Map Title: Percent Renter-Occupied Housing Units in the Appalachian Region, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

The share of renter-occupied housing units during the 2011-2015 period was well below the national average throughout Appalachia; in fact, it was less than 25 percent in 175 of the Region's 420 counties. Among the 21 Appalachian counties where the share of renter-occupied units matched or exceeded the national average, most are home to colleges or universities, where students make up a fairly sizeable share of the population. Examples of these counties include Centre County, Pennsylvania (Penn State University); Monongalia County, West Virginia (West Virginia University); and Oktibbeha County, Mississippi (Mississippi State University).

Table 4.2: Percentage Point Change in Occupancy and Tenure of Housing Units in the Appalachian Region, 2006-2010 to 2011-2015

Housing Occupancy and Tenure	Percentage Point C Total Housi Housing	ng Units	Percentage Point Change, Share of Occupied Housing Units Housing Units		
	Occupied	Vacant	Owner-Occupied	Renter-Occupied	
United States	- 0.1	+ 0.1	- 2.7	+ 2.7	
Appalachian Region	- 0.6	+ 0.6	- 2.1	+ 2.1	
Subregions					
Northern Appalachia	- 0.7	+ 0.7	- 1.6	+ 1.6	
North Central Appalachia	- 0.3	+ 0.3	- 2.1	+ 2.1	
Central Appalachia	+ 0.0	+ 0.0	- 1.7	+ 1.7	
South Central Appalachia	- 1.4	+ 1.4	- 2.5	+ 2.5	
Southern Appalachia	- 0.4	+ 0.4	- 2.7	+ 2.7	
County Types					
Large Metros (pop. 1 million +)	+ 0.4	- 0.4	- 2.7	+ 2.7	
Small Metros (pop. <1 million)	- 0.8	+ 0.8	- 2.3	+ 2.3	
Nonmetro, Adjacent to Large Metros	- 0.6	+ 0.6	- 1.7	+ 1.7	
Nonmetro, Adjacent to Small Metros	- 1.4	+ 1.4	- 1.6	+ 1.6	
Rural (nonmetro, not adj. to a metro)	- 1.0	+ 1.0	- 1.6	+ 1.6	
Alabama	- 0.8	+ 0.8	- 2.4	+ 2.4	
Appalachian Alabama	- 0.8	+ 0.8	- 2.1	+ 2.1	
Non-Appalachian Alabama	- 0.8	+ 0.8	- 3.0	+ 3.0	
Georgia	+ 0.2	- 0.2	- 3.9	+ 3.9	
Appalachian Georgia	- 0.1	+ 0.1	- 3.7	+ 3.7	
Non-Appalachian Georgia	+ 0.4	- 0.4	- 4.0	+ 4.0	
Kentucky	+ 0.2	- 0.2	- 2.7	+ 2.7	
Appalachian Kentucky	+ 0.9	- 0.9	- 2.2	+ 2.2	
Non-Appalachian Kentucky	- 0.2	+ 0.2	- 2.8	+ 2.8	
Maryland	- 0.2	+ 0.2	- 2.2	+ 2.2	
Appalachian Maryland	- 1.0	+ 1.0	- 2.3	+ 2.3	
Non-Appalachian Maryland	- 0.2	+ 0.2	- 2.2	+ 2.2	
Mississippi	- 1.1	+ 1.1	- 2.4	+ 2.4	
Appalachian Mississippi	- 0.9	+ 0.9	- 1.7	+ 1.7	
Non-Appalachian Mississippi	- 1.1	+ 1.1	- 2.6	+ 2.6	
New York	- 0.6	+ 0.6	- 1.6	+ 1.6	
Appalachian New York	- 1.7	+ 1.7	- 1.0	+ 1.0	
Non-Appalachian New York	- 0.6	+ 0.6	- 1.6	+ 1.6	
North Carolina	- 0.2	+ 0.2	- 3.0	+ 3.0	
Appalachian North Carolina	- 1.8	+ 1.8	- 2.8	+ 2.8	
Non-Appalachian North Carolina  Ohio	+ 0.1	- 0.1	- 2.9	+ 2.9	
	+ 0.1	- 0.1	- 2.9	+ 2.9	
Appalachian Ohio	- 0.3	+ 0.3	- 2.4	+ 2.4	
Non-Appalachian Ohio	+ 0.1	- 0.1 + <b>0.4</b>	- 2.9	+ 2.9	
Pennsylvania	- 0.4	-	- 1.8	+ 1.8	
Appalachian Pennsylvania	- 0.5	+ 0.5	- 1.5	+ 1.5	
Non-Appalachian Pennsylvania	- 0.4	+ 0.4	- 2.1	+ 2.1	
South Carolina	+ 0.1	- 0.1	- 1.3	+ 1.3	
Appalachian South Carolina	+ 0.4	- 0.4	- 2.1 1.0	+ 2.1	
Non-Appalachian South Carolina  Tennessee	+ 0.0 - <b>0.5</b>	+ 0.0 + <b>0.5</b>	- 1.0 <b>- 2.8</b>	+ 1.0 <b>+ 2.8</b>	
	- 0.5	+ 0.5			
Appalachian Tennessee Non-Appalachian Tennessee	+ 0.0	+ 1.1 + 0.0	- 2.3 - 3.2	+ 2.3 + 3.2	
Virginia	- 0.2	+ 0.0 + <b>0.2</b>	- 3.2 - <b>2.7</b>	+ 3.2 + <b>2.7</b>	
Appalachian Virginia					
	- 1.3 - 0.2	+ 1.3	- 1.5	+ 1.5	
Non-Appalachian Virginia West Virginia (entire state)	- 0.2 - <b>0.4</b>	+ 0.2 + <b>0.4</b>	- 2.8 <b>- 2.1</b>	+ 2.8 + <b>2.1</b>	

Note: Since occupied units and vacant units sum to the total number of housing units, the sum of the percentage point changes for the two categories will equal zero. The same principle holds for the sum of the percentage point changes for owner-occupied units and renter-occupied units, since these two categories sum to the total number of occupied housing units.

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

**NEW YORK** PENNSYLVANIA OHIO WEST VIRGINIA VIRGINIA TENNESSEE **NORTH** CAROLINA Change in Share of Housing SOUTH CAROLINA Units That Are Occupied, 2006-2010 to 2011-2015 U.S. AVG.: -0.1 PCT. POINTS **GEORGIA** APPALACHIAN AVG.: -0.6 PCT. POINTS No change or increase MISSISSIPPI -1.9 to -0.1 percentage points -2 percentage points or more **ALABAMA** Miles

Figure 4.5: Percentage Point Change in the Share of Housing Units in the Appalachian Region That Are Occupied, 2006-2010 to 2011-2015

Map Title: Percentage Point Change in the Share of Housing Units in the Appalachian Region That Are Occupied, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Appalachia's home occupancy rate in 2011-2015 was more than half a percentage point lower than it was in 2006-2010, a greater decline than the nation as a whole. While this might reflect the effects of the Great Recession, other factors may also be at play. For example, severe weather events like the "Super Outbreak" of tornadoes that swept through parts of Mississippi, Alabama, Georgia, and Tennessee in April 2011, caused extreme structural damage and displaced families and (in some cases) entire communities. In 154 Appalachian counties, however, the occupancy rate stayed the same or increased between the two periods, and the rate rose at least two percentage points in 61 of these counties. Kentucky had 23 of the 61 counties in the latter group; indeed, in that state's Appalachian section, the occupancy rate increased nearly a full percentage point during the period.

**NEW YORK** PENNSYLVANIA оню WEST VIRGINIA VIRGINIA TENNESSEE **NORTH** CAROLINA Change in Share of Housing SOUTH CAROLINA Units That Are Vacant. 2006-2010 to 2011-2015 U.S. AVG.: +0.1 PCT. POINTS GEORGIA APPALACHIAN AVG.: +0.6 PCT. POINTS +2 percentage points or more MISSISSIPPI +0.1 to +1.9 percentage points No change or decrease **ALABAMA** Miles

Figure 4.6: Percentage Point Change in the Share of Housing Units in the Appalachian Region That Are Vacant, 2006-2010 to 2011-2015

Map Title: Percentage Point Change in the Share of Housing Units in the Appalachian Region That Are Vacant, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Between 2006-2010 and 2011-2015, the percentage of vacant housing units rose 0.6 percentage points in Appalachia, while it barely increased in the nation as a whole. The increase likewise matched or exceeded the U.S. average in 266 of the Region's 420 counties. While this at least partly suggests the failure of occupancy rates to return to pre-recessionary levels, another possible factor could be an increase in the share of vacant units that were designed for seasonal or occasional use (which would suggest significant recreational or retirement activity, such as in much of Appalachian North Carolina). In 139 of the 266 Appalachian counties where overall vacancy rates rose at or above the national average, the percentage of vacant units designed for seasonal use also increased.

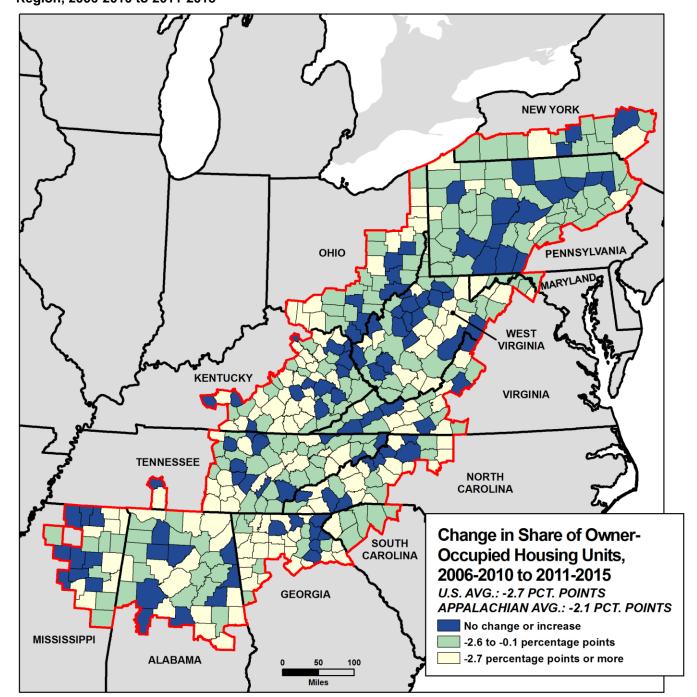


Figure 4.7: Percentage Point Change in the Share of Owner-Occupied Housing Units in the Appalachian Region, 2006-2010 to 2011-2015

Map Title: Percentage Point Change in the Share of Owner-Occupied Housing Units in the Appalachian Region, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

The share of owner-occupied housing units fell by two percentage points in the Appalachian Region between 2006-2010 and 2011-2015. The decline was even greater for the nation, as well as in 146 Appalachian counties where homeownership rates fell by at least 2.7 percentage points (the national average). Still, there were 104 counties in the Region—80 of which were outside metropolitan areas—where homeownership either stayed the same or increased during the period. While these 104 counties were scattered throughout Appalachia, 55 of them were in four states—Pennsylvania, West Virginia, Kentucky, and Tennessee. (West Virginia alone had 17 of these counties.)

**NEW YORK** PENNSYLVANIA оню WEST VIRGINIA VIRGINIA TENNESSEE **NORTH** CAROLINA Change in Share of Renter-SOUTH Occupied Housing Units, CAROLINA 2006-2010 to 2011-2015 U.S. AVG.: +2.7 PCT. POINTS **GEORGIA** APPALACHIAN AVG.: +2.1 PCT. POINTS +2.7 percentage points or more MISSISSIPPI +0.1 to +2.6 percentage points No change or decrease **ALABAMA** Miles

Figure 4.8: Percentage Point Change in the Share of Renter-Occupied Housing Units in the Appalachian Region, 2006-2010 to 2011-2015

Map Title: Percentage Point Change in the Share of Renter-Occupied Housing Units in the Appalachian Region, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Although the share of renter-occupied housing units didn't increase as much in Appalachia as it did nationwide between 2006-2010 and 2011-2015, there were variations within the Region. In 146 Appalachian counties, for example, the increases in rental rates matched or exceeded the national average. More than half of the counties in this group were in South Central and Southern Appalachia; in Georgia's Appalachian section alone, the share increased almost four percentage points. Conversely, the percentage of units occupied by renters either stayed the same or decreased in 103 counties.

#### TRENDS IN HOUSING OCCUPANCY AND TENURE

- At just over 85 percent in 2011-2015, Appalachia's home occupancy rate is 0.6 percentage points lower than it was in 2006-2010 (see Tables 4.1 and 4.2). This decrease was present among all subregions except Central Appalachia, all county types except the ones in large metropolitan areas, and the Appalachian portions of every state except Kentucky and South Carolina. And although the dip suggests that occupancy rates have not yet returned to pre-recession levels, other factors might be at play—for example, the displacement caused by severe weather events like the April 2011 Super Outbreak of tornadoes that devastated parts of Mississippi, Alabama, Georgia, and Tennessee.
- Among the subregions, the occupancy rate declined 1.4 percentage points in South Central Appalachia, while it stayed the same in Central Appalachia. And occupancy rates rose nearly half a percentage point in large metropolitan areas while decreasing among other county types. And in Kentucky's Appalachian counties, occupancy rates rose by nearly a full percentage point.
- One factor behind the decline in Appalachia's occupancy rates from 2006-2010 to 2011-2015 might
  be an increase in the percentage of vacant units that were designed for seasonal or occasional use.
  Between the two periods, the share of such units rose nearly two percentage points in Appalachia—
  and almost three points nationwide.
- Homeownership rates in Appalachia fell two percentage points between 2006-2010 and 2011-2015.
   Among subregions, the declines were greatest in South Central and Southern Appalachia, while there was an urban/rural pattern among county types (with the drop in homeownership being greatest among counties in large metropolitan areas). As with the drop in the occupancy rate, the decrease in homeownership partly suggests the continued effects of the 2007-2009 recession and the slow economic recovery that has followed.

# **CHAPTER 5: EDUCATION**

Table 5.1: Educational Attainment of Persons Ages 25 and Over in the Appalachian Region, 2011-2015

	Total		Percent of F	Population Ages 2	25 and Over	
	Population			High School Di	iploma or More	
Education (Highest Level Attained)	Ages 25 and Over, 2011-2015	Less than High School Diploma	Total	H.S. Grad, No Postsecondary Degree	Associate's Degree	Bachelor's Degree or More
United States	211,462,522	13.3	86.7	48.8	8.1	29.8
Appalachian Region	17,406,203	14.5	85.5	54.7	8.2	22.6
Subregions						
Northern Appalachia	5,816,582	10.3	89.7	56.9	9.1	23.6
North Central Appalachia	1,674,941	14.3	85.7	59.0	7.5	19.3
Central Appalachia	1,319,117	23.4	76.6	57.0	6.3	13.3
South Central Appalachia	3,312,336	15.6	84.4	53.3	7.9	23.2
Southern Appalachia	5,283,227	16.3	83.7	51.3	7.9	24.5
County Types	-,,					
Large Metros (pop. 1 million +)	4,056,868	10.8	89.2	50.8	8.6	29.8
Small Metros (pop. <1 million)	7,321,490	13.6	86.4	54.2	8.1	24.0
Nonmetro, Adjacent to Large Metros	1,503,593	16.0	84.0	59.0	8.4	16.6
Nonmetro, Adjacent to Small Metros	2,785,352	17.4	82.6	58.9	7.8	15.9
Rural (nonmetro, not adj. to a metro)	1,738,900	21.0	79.0	55.9	7.5 7.5	15.6
Alabama	3,239,351	15.7	84.3	53.0	7.8	23.5
Appalachian Alabama	2,090,452	15.7	84.3	52.5	7.7	24.0
Non-Appalachian Alabama	1,148,899	15.8	84.2	53.9	7.8	22.6
Georgia	6,500,205	14.6	85.4	49.4	7.0	28.8
Appalachian Georgia	1,978,116	16.2	83.8	50.3	7.5	26.0
Non-Appalachian Georgia		13.9	86.1	49.0	7.5 7.0	30.1
	4,522,089	15.8	84.2	54.4	7.0 <b>7.5</b>	22.3
Kentucky	2,955,216					
Appalachian Kentucky	805,733	23.4	76.6	56.1	6.5	14.0
Non-Appalachian Kentucky	2,149,483	13.0	87.0	53.8	7.9	25.4
Maryland	4,018,459	10.6	89.4	45.1	6.4	37.9
Appalachian Maryland	175,692	12.6	87.4	60.2	8.1	19.1
Non-Appalachian Maryland	3,842,767	10.5	89.5	44.4	6.3	38.8
Mississippi	1,940,365	17.7	82.3	53.1	8.6	20.7
Appalachian Mississippi	408,823	20.8	79.2	53.4	8.5	17.4
Non-Appalachian Mississippi	1,531,542	16.8	83.2	53.0	8.6	21.5
New York	13,435,795	14.4	85.6	42.9	8.5	34.2
Appalachian New York	703,251	10.5	89.5	52.5	12.0	25.0
Non-Appalachian New York	12,732,544	14.6	85.4	42.4	8.3	34.7
North Carolina	6,582,301	14.2	85.8	48.5	9.0	28.4
Appalachian North Carolina	1,200,961	15.7	84.3	50.4	9.1	24.9
Non-Appalachian North Carolina	5,381,340	13.9	86.1	48.1	8.9	29.1
Ohio	7,817,508	10.9	89.1	54.8	8.2	26.1
Appalachian Ohio	1,391,706	13.7	86.3	61.2	8.4	16.7
Non-Appalachian Ohio	6,425,802	10.3	89.7	53.4	8.2	28.1
Pennsylvania	8,814,112	10.8	89.2	52.7	7.9	28.6
Appalachian Pennsylvania	4,059,387	9.7	90.3	56.3	9.0	25.1
Non-Appalachian Pennsylvania	4,754,725	11.7	88.3	49.6	7.0	31.6
South Carolina	3,210,007	14.4	85.6	50.8	8.9	25.8
Appalachian South Carolina	805,836	15.7	84.3	49.7	9.1	25.5
Non-Appalachian South Carolina	2,404,171	14.0	86.0	51.1	8.9	26.0
Tennessee	4,380,036	14.5	85.5	54.0	6.6	24.9
Appalachian Tennessee	1,959,646	16.2	83.8	55.7	6.8	21.3
Non-Appalachian Tennessee	2,420,390	13.2	86.8	52.6	6.4	27.9
Virginia	5,566,373	11.7	88.3	44.8	7.3	36.3
Appalachian Virginia	528,482	18.5	81.5	53.9	8.4	19.3
Non-Appalachian Virginia	5,037,891	10.9	89.1	43.8	7.1	38.1
West Virginia (entire state)	1,298,118	15.0	85.0	59.2	6.6	19.2

Table 5.2: Educational Attainment of Persons Ages 25 to 64 in the Appalachian Region, 2011-2015

	_		Percent	of Population Ag	es 25-64		
	Total Population			High School Diploma or More			
Education (Highest Level Attained)	Ages 25-64, 2011-2015	Less than High School Diploma	Total	H.S. Grad, No Postsecondary Degree	Associate's Degree	Bachelor's Degree or More	
United States	166,847,045	11.8	88.2	48.1	8.8	31.3	
Appalachian Region	13,261,421	12.0	88.0	54.3	9.4	24.3	
Subregions							
Northern Appalachia	4,337,228	8.0	92.0	55.1	10.8	26.1	
North Central Appalachia	1,274,290	11.3	88.7	59.1	8.7	20.9	
Central Appalachia	1,007,108	18.4	81.6	60.1	7.5	14.1	
South Central Appalachia	2,462,680	12.8	87.2	53.8	9.1	24.4	
Southern Appalachia	4,180,115	14.4	85.6	51.0	8.8	25.8	
County Types	,,						
Large Metros (pop. 1 million +)	3,201,710	9.0	91.0	48.9	9.7	32.4	
Small Metros (pop. <1 million)	5,573,005	11.4	88.6	53.7	9.3	25.7	
Nonmetro, Adjacent to Large Metros	1,131,906	13.4	86.6	59.2	9.9	17.6	
Nonmetro, Adjacent to Small Metros	2,052,771	14.3	85.7	59.9	9.2	16.6	
Rural (nonmetro, not adj. to a metro)	1,302,029	17.3	82.7	57.6	8.8	16.3	
Alabama	2,520,025	13.7	86.3	52.9	8.7	24.7	
Appalachian Alabama	1,629,287	13.7	86.3	52.2	8.7	25.5	
Non-Appalachian Alabama	890,738	13.6	86.4	54.2	8.8	23.4	
Georgia	5,309,738	12.9	87.1	49.1	7.8	30.2	
Appalachian Georgia	1,612,714	14.7	85.3	49.8	8.2	27.3	
Non-Appalachian Georgia	3,697,024	12.1	87.9	48.8	7.6	31.5	
Kentucky	2,322,241	12.7	87.3	54.9	8.6	23.9	
Appalachian Kentucky	620,775	18.6	81.4	58.9	7.6	14.9	
	1,701,466	10.5	89.5	53.5	7.0 8.9	27.1	
Non-Appalachian Kentucky		9.1	90.9	44.5		39.6	
Maryland	3,227,308	10.4	89.6	59.8	6.9		
Appalachian Maryland	133,286				9.4	20.5	
Non-Appalachian Maryland	3,094,022	9.0	91.0	43.8	6.8	40.4	
Mississippi	1,525,532	15.3	84.7	53.6	9.7	21.4	
Appalachian Mississippi	313,810	17.9	82.1	54.3	9.9	18.0	
Non-Appalachian Mississippi	1,211,722	14.6	85.4	53.5	9.7	22.2	
New York	10,615,360	12.3	87.7	41.7	9.4	36.6	
Appalachian New York	526,100	8.6	91.4	51.4	13.6	26.4	
Non-Appalachian New York	10,089,260	12.5	87.5	41.2	9.2	37.1	
North Carolina	5,181,109	12.3	87.7	47.9	9.8	30.0	
Appalachian North Carolina	885,456	13.6	86.4	50.4	10.4	25.6	
Non-Appalachian North Carolina	4,295,653	12.1	87.9	47.4	9.7	30.8	
Ohio	6,070,227	8.9	91.1	53.6	9.4	28.1	
Appalachian Ohio	1,052,001	11.4	88.6	60.6	10.0	18.1	
Non-Appalachian Ohio	5,018,226	8.3	91.7	52.1	9.3	30.2	
Pennsylvania	6,729,726	8.5	91.5	51.0	9.1	31.4	
Appalachian Pennsylvania	3,025,947	7.2	92.8	54.2	10.6	28.0	
Non-Appalachian Pennsylvania	3,703,779	9.5	90.5	48.4	7.9	34.2	
South Carolina	2,483,228	12.4	87.6	51.1	9.8	26.7	
Appalachian South Carolina	624,304	13.3	86.7	49.8	10.1	26.8	
Non-Appalachian South Carolina	1,858,924	12.0	88.0	51.6	9.7	26.7	
Tennessee	3,429,711	11.9	88.1	54.2	7.3	26.6	
Appalachian Tennessee	1,469,939	12.9	87.1	56.8	7.8	22.5	
Non-Appalachian Tennessee	1,959,772	11.1	88.9	52.3	7.0	29.6	
Virginia	4,464,712	9.5	90.5	44.2	7.9	38.4	
Appalachian Virginia	388,990	13.5	86.5	55.5	9.7	21.2	
Non-Appalachian Virginia	4,075,722	9.1	90.9	43.2	7.7	40.0	
West Virginia (entire state)	978,812	11.8	88.2	59.6	7.7	20.9	

Table 5.3: Educational Attainment of Persons Ages 65 and Over in the Appalachian Region, 2011-2015

	Total	Percent of Population Ages 65 and Over						
	Population		High School Diploma or Mor					
Education (Highest Level Attained)	Ages 65 and Over, 2011-2015	Less than High School Diploma	Total	H.S. Grad, No Postsecondary Degree	Associate's Degree	Bachelor's Degree or More		
United States	44,615,477	19.0	81.0	51.7	5.1	24.1		
Appalachian Region	4,144,782	22.6	77.4	55.9	4.3	17.2		
Subregions								
Northern Appalachia	1,479,354	17.2	82.8	62.0	4.3	16.4		
North Central Appalachia	400,651	23.9	76.1	58.6	3.5	14.0		
Central Appalachia	312,009	39.6	60.4	47.1	2.6	10.7		
South Central Appalachia	849,656	23.8	76.2	51.9	4.7	19.6		
Southern Appalachia	1,103,112	23.5	76.5	52.4	4.7	19.4		
County Types								
Large Metros (pop. 1 million +)	855,158	17.4	82.6	57.7	4.6	20.3		
Small Metros (pop. <1 million)	1,748,485	20.9	79.1	55.8	4.5	18.8		
Nonmetro, Adjacent to Large Metros	371,687	23.8	76.2	58.3	4.1	13.8		
Nonmetro, Adjacent to Small Metros	732,581	26.3	73.7	56.1	3.9	13.7		
Rural (nonmetro, not adj. to a metro)	436,871	32.0	68.0	50.8	3.7	13.6		
Alabama	719,326	23.0	77.0	53.4	4.4	19.2		
Appalachian Alabama	461,165	22.8	77.2	53.7	4.4	19.1		
Non-Appalachian Alabama	258,161	23.4	76.6	52.8	4.3	19.5		
Georgia	1,190,467	22.0	78.0	51.1	4.4	22.6		
Appalachian Georgia	365,402	22.4	77.6	52.8	4.7	20.1		
Non-Appalachian Georgia	825,065	21.8	78.2	50.3	4.3	23.6		
Kentucky	632,975	27.5	72.5	52.4	3.5	16.6		
Appalachian Kentucky	184,958	39.8	60.2	46.5	2.6	11.0		
Non-Appalachian Kentucky	448,017	22.4	77.6	54.8	3.9	18.9		
Maryland	791,151	17.0	83.0	47.7	4.4	30.9		
Appalachian Maryland	42,406	19.7	80.3	61.5	4.1	14.6		
Non-Appalachian Maryland	748,745	16.9	83.1	46.9	4.4	31.8		
Mississippi	414,833	26.4	73.6	51.1	4.3	18.1		
Appalachian Mississippi	95,013	30.3	69.7	50.4	3.9	15.5		
Non-Appalachian Mississippi	319,820	25.3	74.7	51.3	4.5	18.9		
New York	2,820,435	22.1	77.9	47.4	5.2	25.3		
Appalachian New York	177,151	16.2	83.8	55.8	7.1	20.9		
Non-Appalachian New York	2,643,284	22.5	77.5	46.8	5.1	25.6		
North Carolina	1,401,192	21.1	78.9	50.7	5.7	22.5		
Appalachian North Carolina	315,505	21.4	78.6	50.5	5.4	22.7		
Non-Appalachian North Carolina	1,085,687	21.0	79.0	50.8	5.8	22.4		
Ohio	1,747,281	17.8	82.2	59.0	4.2	19.0		
Appalachian Ohio	339,705	21.0	79.0	63.0	3.5	12.6		
Non-Appalachian Ohio	1,407,576	17.1	82.9	58.1	4.3	20.6		
Pennsylvania	2,084,386	18.2	81.8	<b>58.0</b>	4.1	19.7		
Appalachian Pennsylvania Non-Appalachian Pennsylvania	1,033,440	17.0	83.0	62.4 53.7	4.0	16.6 22.7		
South Carolina	1,050,946 <b>726,779</b>	19.5 <b>21.5</b>	80.5 <b>78.5</b>	49.6	4.1 <b>5.9</b>	22.7 <b>22.</b> 9		
Appalachian South Carolina	181,532	23.8	76.2	<b>49.6</b> 49.3	5.8	21.1		
Non-Appalachian South Carolina	545,247	20.8	76.2 79.2	49.3 49.8	6.0	23.5		
Tennessee	950,325	20.6 <b>24.1</b>	75.9	53.1	3.7	19.0		
Appalachian Tennessee	489,707	25.8	74.2	52.6	4.0	17.6		
Non-Appalachian Tennessee	460,618	22.3	74.2 77.7	52.6	3.5	20.5		
Virginia	1,101,661	20.3	79.7	46.9	4.8	28.0		
Appalachian Virginia	139,492	32.2	67.8	49.2	4.7	13.9		
Non-Appalachian Virginia	962,169	18.6	81.4	46.6	4.7	30.0		
West Virginia (entire state)	319,306	25.0	<b>75.0</b>	57.9	3.3	13.8		

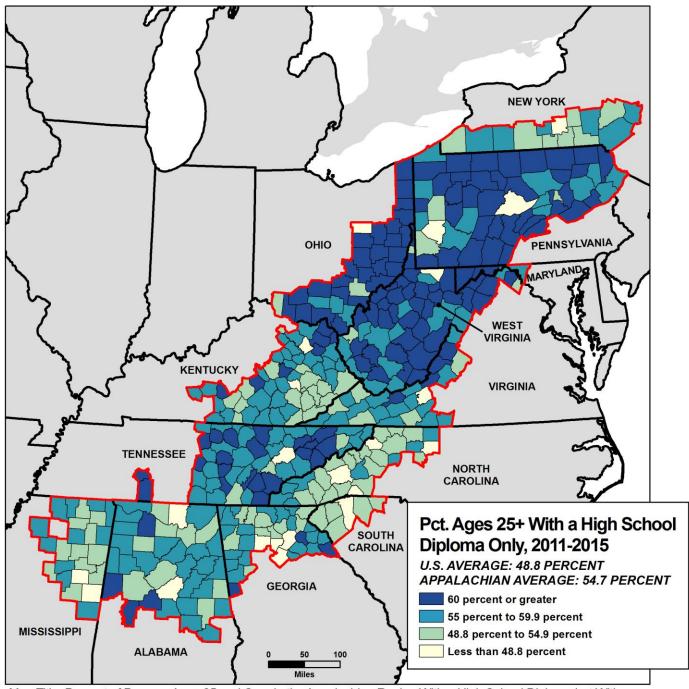
**NEW YORK** PENNSYLVANIA OHIO **WEST** VIRGINIA VIRGINIA TENNESSEE **NORTH CAROLINA** Pct. Ages 25+ With a High School SOUTH Diploma or More, 2011-2015 **CAROLINA** U.S. AVERAGE: 86.7 PERCENT APPALACHIAN AVERAGE: 85.5 PERCENT **GEORGIA** 86.7 percent or greater 80 percent to 86.6 percent **MISSISSIPPI** 75 percent to 79.9 percent **ALABAMA** Less than 75 percent Miles

Figure 5.1: Percent of Persons Ages 25 and Over in the Appalachian Region With a High School Diploma or More, 2011-2015

Map Title: Percent of Persons Ages 25 and Over in the Appalachian Region With a High School Diploma or More, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Although the share of Appalachian adults with at least a high school diploma was slightly below the national average over the 2011-2015 period, it matched or exceeded the national share in 119 counties in the Region—103 of which were either in Northern Appalachia or in metropolitan areas. The rates were especially high in the Appalachian sections of Pennsylvania and New York, where the share of adults who had completed high school was 90 percent and 89 percent, respectively. Yet in 58 counties, less than three-fourths of adults had completed high school; all but three of those counties were in Central, South Central, and Southern Appalachia, and 52 were outside metropolitan areas. More than half of these 58 counties were in Kentucky alone; just 77 percent of adults in the state's Appalachian counties had a high school diploma or more in 2011-2015.

Figure 5.2: Percent of Persons Ages 25 and Over in the Appalachian Region With a High School Diploma but With No Postsecondary Degree, 2011-2015



Map Title: Percent of Persons Ages 25 and Over in the Appalachian Region With a High School Diploma but With No Postsecondary Degree, 2011-2015

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

During the 2011-2015 period, 55 percent of adults in the Appalachian Region had a high school diploma, but no postsecondary degree (including an associate's degree). And the share was at least 60 percent in a full one-third (140) of the Region's 420 counties—most of them in three states: Ohio, Pennsylvania, and West Virginia. Many of these adults had attended college but did not graduate, while others acquired vocational training. Conversely, many of the adults outside of this group did earn an associate's or bachelor's degree, while others never even finished high school.

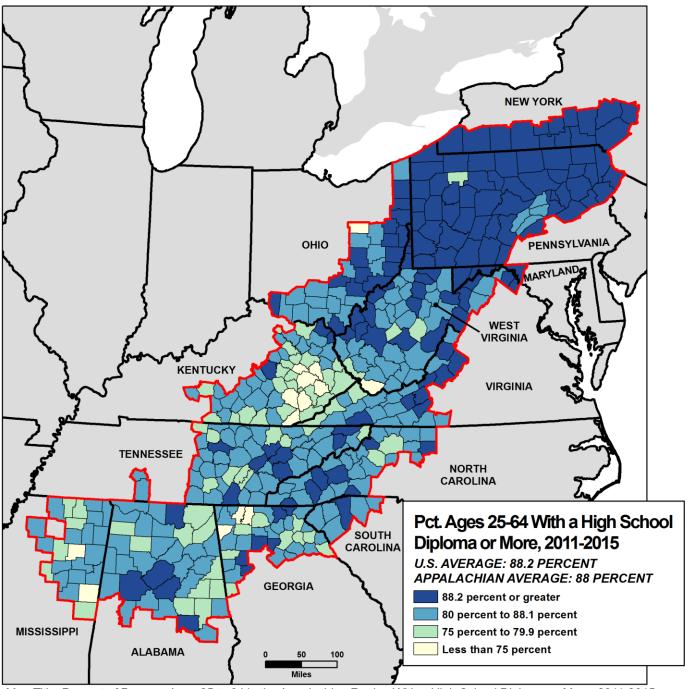
**NEW YORK** PENNSYLVANIA оню WEST VIRGINIA VIRGINIA TENNESSEE **NORTH CAROLINA** Pct. Ages 25+ With a Bachelor's SOUTH **Degree or More, 2011-2015** CAROLINA U.S. AVERAGE: 29.8 PERCENT APPALACHIAN AVERAGE: 22.6 PERCENT **GEORGIA** 29.8 percent or greater 20 percent to 29.7 percent **MISSISSIPPI** 10 percent to 19.9 percent **ALABAMA** Less than 10 percent

Figure 5.3: Percent of Persons Ages 25 and Over in the Appalachian Region With a Bachelor's Degree or More, 2011-2015

Map Title: Percent of Persons Ages 25 and Over in the Appalachian Region With a Bachelor's Degree or More, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

The share of adults with a bachelor's degree or more was seven percentage points lower in Appalachia during the 2011-2015 period than in the nation as a whole. Indeed, the rate was lower than the national average in 399 of the Region's 420 counties. In fact, less than one in five residents ages 25 and over were graduates of a four-year college or university in 324 Appalachian counties. And in 38 counties—nearly all of which were either outside metropolitan areas or in Central Appalachia—the share was less than one in 10. The 21 counties where the percentage of college graduates matched or surpassed the national average were mostly either in metro areas (e.g., Pittsburgh and Birmingham) or home to a college or university (such as Knox County, Tennessee, where the University of Tennessee is located).

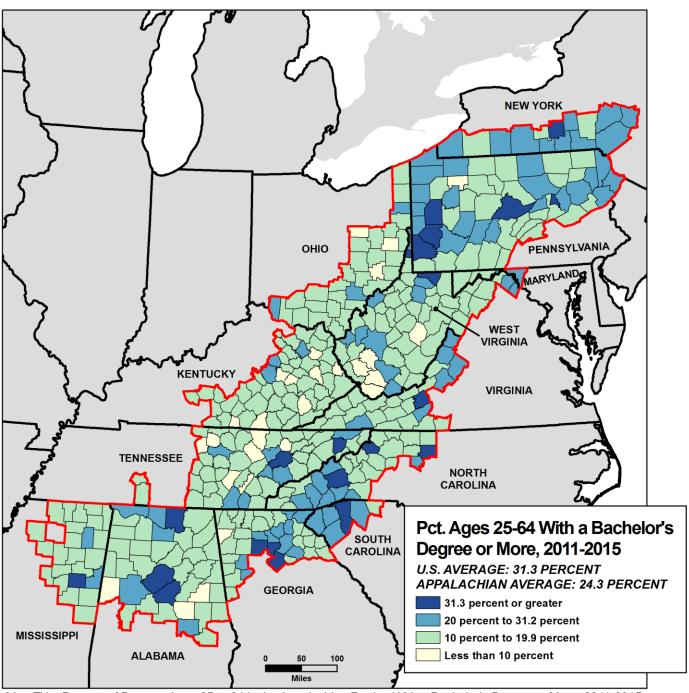
Figure 5.4: Percent of Persons Ages 25 to 64 in the Appalachian Region With a High School Diploma or More, 2011-2015



Map Title: Percent of Persons Ages 25 to 64 in the Appalachian Region With a High School Diploma or More, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In 2011-2015, the percentage of working-age adults (ages 25 to 64) in the Appalachian Region with at least a high school diploma was almost at the national average of just over 88 percent, and the share matched or exceeded the national rate in 140 counties. Slightly more than half of these counties were in metropolitan areas, and most were in Northern or North Central Appalachia. Nearly half of these counties were in New York or Pennsylvania; the share of working-age adults with a high school diploma or more exceeded 90 percent in both states. At the other end of the spectrum, less than three-fourths of working-age adults had finished high school in 14 Appalachian counties. Almost all of these counties were outside metropolitan areas, and half were in Kentucky alone.

Figure 5.5: Percent of Persons Ages 25 to 64 in the Appalachian Region With a Bachelor's Degree or More, 2011-2015



Map Title: Percent of Persons Ages 25 to 64 in the Appalachian Region With a Bachelor's Degree or More, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Just 24 percent of Appalachia's working-age population had a bachelor's degree or more in 2011-2015—seven percentage points lower than the U.S. average of 31 percent. This is a striking indicator of the lower educational level of the Appalachian workforce. Indeed, just 14 percent of working-age adults in Central Appalachia had a bachelor's degree, as did only 16 percent of residents of rural Appalachian counties that were not adjacent to metro areas. There were only 22 Appalachian counties—all either in metro areas (e.g., suburban Atlanta) or home to a four-year college or university (such as Tompkins County, New York, home to Cornell University and Ithaca College)—where the share of working-age adults ages 25 to 64 with at least a bachelor's degree matched or exceeded the national average. In contrast, less than one in 10 adults had a four-year degree in 28 counties. Of the counties in this latter group, 23 were outside metropolitan areas, suggesting a lack of employment opportunities for college-educated adults.

**NEW YORK** PENNSYLVANIA OHIO WEST VIRGINIA VIRGINIA TENNESSEE **NORTH CAROLINA** Pct. Ages 65+ With a Bachelor's SOUTH **Degree or More, 2011-2015 CAROLINA** U.S. AVERAGE: 24.1 PERCENT APPALACHIAN AVERAGE: 17.2 PERCENT **GEORGIA** 24.1 percent or greater 15 percent to 24 percent **MISSISSIPPI** 10 percent to 14.9 percent **ALABAMA** Less than 10 percent

Figure 5.6: Percent of Persons Ages 65 and Over in the Appalachian Region With a Bachelor's Degree or More, 2011-2015

Map Title: Percent of Persons Ages 65 and Over in the Appalachian Region With a Bachelor's Degree or More, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

While nearly one in four older Americans (ages 65 and over) had at least a bachelor's degree in 2011-2015, less than one in 10 older adults had one in 111 of Appalachia's 420 counties. (And in most of these counties, less than two-thirds of older adults had completed high school.) Three-fourths of these counties were outside metropolitan areas, and two-fifths were in Central Appalachia—Kentucky alone had one-fourth of these counties. Yet in 35 Appalachian counties, the share of older adults with a four-year degree was at or above the national average. These were either counties in metropolitan areas (like suburban Atlanta), counties that had a college or university (such as Montgomery County, Virginia, home to Virginia Tech and Radford University), or counties with significant retirement or seasonal activity (the latter suggested by the fact that much of their vacant housing is for seasonal or occasional use—such as Rabun, Towns, and Union counties in Georgia, home of the Chattahoochee-Oconee National Forest).

Table 5.4: Percentage Point Change in Educational Attainment of Persons Ages 25 and Over in the Appalachian Region, 2006-2010 to 2011-2015

	Percentage Point Change in Share of Population Ages 25 and Over							
			High School Diploma or More					
Education (Highest Level Attained)	Less than High School Diploma	Total	H.S. Grad, No Postsecondary Degree	Associate's Degree	Bachelor's Degree or More			
United States	- 1.7	+ 1.7	- 0.8	+ 0.6	+ 1.9			
Appalachian Region	- 2.6	+ 2.6	- 0.1	+ 0.9	+ 1.9			
Subregions								
Northern Appalachia	- 2.0	+ 2.0	- 1.0	+ 0.8	+ 2.0			
North Central Appalachia	- 2.8	+ 2.8	- 0.5	+ 1.3	+ 2.			
Central Appalachia	- 4.6	+ 4.6	+ 2.8	+ 0.7	+ 1.			
South Central Appalachia	- 2.9	+ 2.9	+ 0.4	+ 0.7	+ 1.			
Southern Appalachia	- 2.6	+ 2.6	+ 0.1	+ 0.8	+ 1			
County Types								
Large Metros (pop. 1 million +)	- 1.7	+ 1.7	- 1.2	+ 0.7	+ 2.			
Small Metros (pop. <1 million)	- 2.5	+ 2.5	- 0.2	+ 0.7	+ 1.			
Nonmetro, Adjacent to Large Metros	- 2.6	+ 2.6	+ 0.3	+ 1.0	+ 1.			
Nonmetro, Adjacent to Small Metros	- 3.0	+ 3.0	+ 0.8	+ 0.9	+ 1			
Rural (nonmetro, not adj. to a metro)	- 3.9	+ 3.9	+ 1.5	+ 1.1	+ 1			
Alabama	- 2.9	+ 2.9	+ 0.2	+ 0.9	+ 1			
Appalachian Alabama	- 2.8	+ 2.8	+ 0.1	+ 0.9	+ 1			
Non-Appalachian Alabama	- 3.0	+ 3.0	+ 0.4	+ 0.8	+ 1			
Georgia	- 1.9	+ 1.9	- 0.3	+ 0.6	+ 1			
Appalachian Georgia	- 2.1	+ 2.1	- 0.1	+ 0.7	+ 1			
Non-Appalachian Georgia	- 1.9	+ 1.9	- 0.4	+ 0.5	+ 1			
Kentucky	- 3.2	+ 3.2	+ 0.4	+ 0.9	+ 2			
Appalachian Kentucky	- 4.8	+ 4.8	+ 2.8	+ 0.9	+ 1			
Non-Appalachian Kentucky	- 2.5	+ 4.6	- 0.5	+ 0.9	+ 2			
Maryland	- 1.6	+ 1.6	- 0.6	+ 0.9	+ 2			
	- 3.4	+ 3.4	+ 1.7	+ 0.3	+ 1			
Appalachian Maryland	- 3.4	+ 3.4 + 1.6	+ 1.7 - 0.7	+ 0.3	+ 1			
Non-Appalachian Maryland  Mississippi	- 2.7	+ 1.0	+ 0.5	+ 1.0	+ 2			
				-				
Appalachian Mississippi	- 3.3	+ 3.3	+ 0.6	+ 1.4	+ 1			
Non-Appalachian Mississippi	- 2.6	+ 2.6	+ 0.5	+ 0.8	+ 1			
New York	- 1.2	+ 1.2	- 1.2	+ 0.3	+ 2			
Appalachian New York	- 1.6	+ 1.6	- 0.5	+ 0.7	+ 1			
Non-Appalachian New York	- 1.2	+ 1.2	- 1.2	+ 0.3	+ 2			
North Carolina	- 2.2	+ 2.2	- 0.6	+ 0.7	+ 2			
Appalachian North Carolina	- 2.2	+ 2.2	- 0.7	+ 0.7	+ 2			
Non-Appalachian North Carolina	- 2.2	+ 2.2	- 0.6	+ 0.6	+ 2			
Ohio	- 1.7	+ 1.7	- 1.2	+ 0.9	+ 2			
Appalachian Ohio	- 2.0	+ 2.0	- 0.9	+ 1.5	+1			
Non-Appalachian Ohio	- 1.6	+ 1.6	- 1.2	+ 0.8	+ 2			
Pennsylvania	- 1.8	+ 1.8	- 1.0	+ 0.6	+ 2			
Appalachian Pennsylvania	- 1.9	+ 1.9	- 1.2	+ 0.9	+ 2			
Non-Appalachian Pennsylvania	- 1.7	+ 1.7	- 0.8	+ 0.4	+ 2			
South Carolina	- 2.6	+ 2.6	+ 0.0	+ 0.6	+1			
Appalachian South Carolina	- 2.7	+ 2.7	+ 0.2	+ 0.5	+ 2			
Non-Appalachian South Carolina	- 2.5	+ 2.5	- 0.1	+ 0.7	+ 1			
Tennessee	- 3.0	+ 3.0	+ 0.2	+ 0.6	+ 2			
Appalachian Tennessee	- 3.3	+ 3.3	+ 1.0	+ 0.8	+ 1			
Non-Appalachian Tennessee	- 2.7	+ 2.7	- 0.5	+ 0.5	+ 2			
Virginia	- 2.2	+ 2.2	- 0.8	+ 0.6	+ 2			
Appalachian Virginia	- 4.4	+ 4.4	+ 1.7	+ 0.5	+ 2			
Non-Appalachian Virginia	- 2.0	+ 2.0	- 1.1	+ 0.6	+ 2			
West Virginia (entire state)	- 3.1	+ 3.1	+ 0.3	+ 0.8	+ 1			

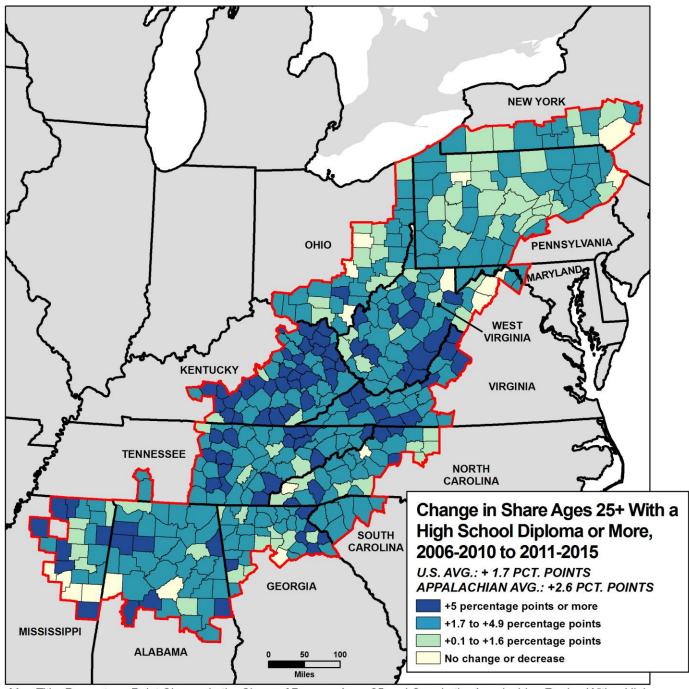
Table 5.5: Percentage Point Change in Educational Attainment of Persons Ages 25 to 64 in the Appalachian Region, 2006-2010 to 2011-2015

	Per	centage Point Cha	ange in Share of Po	pulation Ages 25-6	4	
Education (Himboot Lovel Attained)	Less than		High School Diploma or More			
Education (Highest Level Attained)	High School Diploma	Total	H.S. Grad, No Postsecondary Degree	Associate's Degree	Bachelor's Degree or More	
United States	- 0.9	+ 0.9	- 1.0	+ 0.4	+ 1.	
Appalachian Region	- 1.5	+ 1.5	- 1.0	+ 0.9	+ 1.	
Subregions						
Northern Appalachia	- 0.6	+ 0.6	- 1.9	+ 0.8	+ 1.	
North Central Appalachia	- 1.7	+ 1.7	- 1.6	+ 1.4	+ 2.	
Central Appalachia	- 3.8	+ 3.8	+ 2.2	+ 0.8	+ 0.	
South Central Appalachia	- 1.9	+ 1.9	- 0.4	+ 0.7	+ 1.	
Southern Appalachia	- 1.5	+ 1.5	- 0.7	+ 0.8	+ 1.	
County Types						
Large Metros (pop. 1 million +)	- 0.6	+ 0.6	- 2.0	+ 0.7	+ 2.	
Small Metros (pop. <1 million)	- 1.3	+ 1.3	- 0.9	+ 0.7	+ 1.	
Nonmetro, Adjacent to Large Metros	- 1.6	+ 1.6	- 0.4	+ 1.1	+ 1.	
Nonmetro, Adjacent to Small Metros	- 1.8	+ 1.8	- 0.1	+ 1.0	+ 0.	
Rural (nonmetro, not adj. to a metro)	- 2.8	+ 2.8	+ 0.6	+ 1.2	+ 1.	
Alabama	- 1.7	+ 1.7	- 0.5	+ 0.8	+ 1.	
Appalachian Alabama	- 1.6	+ 1.6	- 0.7	+ 0.9	+ 1.	
Non-Appalachian Alabama	- 2.0	+ 2.0	- 0.2	+ 0.8	+ 1.	
Georgia	- 1.2	+ 1.2	- 0.7	+ 0.6	+ 1.	
Appalachian Georgia	- 1.3	+ 1.3	- 0.6	+ 0.8	+ 1.	
Non-Appalachian Georgia	- 1.2	+ 1.2	- 0.8	+ 0.6	+ 1.	
Kentucky	- 2.1	+ 2.1	- 0.5	+ 1.0	+ 1.	
Appalachian Kentucky	- 3.9	+ 3.9	+ 1.9	+ 0.9	+ 1	
Non-Appalachian Kentucky	- 1.4	+ 1.4	- 1.4	+ 0.9	+ 1.	
Maryland	- 0.8	+ 0.8	- 0.9	+ 0.0	+ 1.	
Appalachian Maryland	- 1.8	+ 1.8	+ 0.5	+ 0.2	+ 1.	
Non-Appalachian Maryland	- 0.8	+ 0.8	- 1.0	+ 0.0	+ 1.	
Mississippi	- 1.8	+ 1.8	- 0.1	+ 1.0	+ 0	
Appalachian Mississippi	- 2.2	+ 2.2	- 0.3	+ 1.6	+ 1.	
Non-Appalachian Mississippi	- 1.7	+ 1.7	+ 0.1	+ 0.9	+ 0.	
New York	- 0.6	+ 0.6	- 1.3	+ 0.1	+ 1.	
Appalachian New York	- 0.8	+ 0.8	- 0.3	+ 0.5	+ 0.	
Non-Appalachian New York	- 0.6	+ 0.6	- 1.4	+ 0.1	+ 1.	
North Carolina	- 1.3	+ 1.3	- 1.3	+ 0.5	+ 2.	
Appalachian North Carolina	- 1.1	+ 1.1	- 1.4	+ 0.7	+ 1.	
Non-Appalachian North Carolina	- 1.3	+ 1.3	- 1.3	+ 0.5	+ 2.	
Ohio	- 0.7	+ 0.7	- 1.9	+ 0.9	+ 1.	
Appalachian Ohio	- 0.7	+ 0.7	- 2.0	+ 1.7	+ 1.	
Non-Appalachian Ohio	- 0.8	+ 0.8	- 1.8	+ 0.7	+ 1.	
Pennsylvania	- 0.6	+ 0.6	- 1.9	+ 0.5	+ 2.	
Appalachian Pennsylvania	- 0.6	+ 0.6	- 2.3	+ 0.8	+ 2.	
Non-Appalachian Pennsylvania	- 0.6	+ 0.6	- 1.5	+ 0.4	+ 1.	
South Carolina	- 1.6	+ 1.6	- 0.5	+ 0.6	+ 1.	
Appalachian South Carolina	- 1.9	+ 1.9	- 0.3	+ 0.5	+ 1.	
Non-Appalachian South Carolina	- 1.6	+ 1.6	- 0.6	+ 0.6	+ 1.	
Tennessee	- 2.0	+ 2.0	- 0.6	+ 0.5	+ 2.	
Appalachian Tennessee	- 2.5	+ 2.5	+ 0.4	+ 0.9	+ 1.	
Non-Appalachian Tennessee	- 1.7	+ 1.7	- 1.3	+ 0.4	+ 2.	
Virginia	- 1.7	+ 1.7	- 1.2	+ 0.6	+ 2.	
Appalachian Virginia	- 3.5	+ 3.5	+ 0.9	+ 0.2	+ 2.	
Non-Appalachian Virginia	- 1.5	+ 1.5	- 1.2	+ 0.6	+ 2.	
West Virginia (entire state)	- 2.0	+ 2.0	- 0.8	+ 0.9	+ 1.	

Table 5.6: Percentage Point Change in Educational Attainment of Persons Ages 65 and Over in the Appalachian Region, 2006-2010 to 2011-2015

	Percentage Point Change in Share of Population Ages 65 and Over							
			High School Diploma or More					
Education (Highest Level Attained)	Less than High School Diploma	Total	H.S. Grad, No Postsecondary Degree	Associate's Degree	Bachelor's Degree or More			
United States	- 5.3	+ 5.3	+ 0.1	+ 1.2	+ 4.			
Appalachian Region	- 7.4	+ 7.4	+ 2.6	+ 1.3	+ 3.			
Subregions								
Northern Appalachia	- 6.5	+ 6.5	+ 1.6	+ 1.3	+ 3.			
North Central Appalachia	- 7.5	+ 7.5	+ 3.6	+ 1.2	+ 2			
Central Appalachia	- 9.9	+ 9.9	+ 6.6	+ 0.8	+ 2			
South Central Appalachia	- 7.7	+ 7.7	+ 3.2	+ 1.3	+ 3			
Southern Appalachia	- 8.2	+ 8.2	+ 3.0	+ 1.4	+ 3			
County Types								
Large Metros (pop. 1 million +)	- 7.0	+ 7.0	+ 1.2	+ 1.5	+ 4			
Small Metros (pop. <1 million)	- 7.0	+ 7.0	+ 2.1	+ 1.3	+ 3			
Nonmetro, Adjacent to Large Metros	- 7.2	+ 7.2	+ 2.8	+ 1.4	+ 3			
Nonmetro, Adjacent to Small Metros	- 8.0	+ 8.0	+ 4.2	+ 1.3	+ 2			
Rural (nonmetro, not adj. to a metro)	- 8.9	+ 8.9	+ 5.2	+ 1.1	+ 2			
Alabama	- 8.2	+ 8.2	+ 3.0	+ 1.4	+ 3			
Appalachian Alabama	- 8.6	+ 8.6	+ 3.3	+ 1.5	+ 3			
Non-Appalachian Alabama	- 7.5	+ 7.5	+ 2.5	+ 1.1	+ 3			
Georgia	- 7.2	+ 7.2	+ 2.2	+ 0.9	+ 4			
Appalachian Georgia	- 8.1	+ 8.1	+ 2.8	+ 1.2	+ 4			
Non-Appalachian Georgia	- 6.9	+ 6.9	+ 1.9	+ 0.8	+ 4			
Kentucky	- 9.0	+ 9.0	+ 4.2	+ 1.1	+ 3			
Appalachian Kentucky	- 10.4	+ 10.4	+ 7.0	+ 0.9	+ 2			
Non-Appalachian Kentucky	- 8.2	+ 8.2	+ 3.0	+ 1.2	+ 4			
Maryland	- 6.0	+ 6.0	+ 0.5	+ 0.7	+ 4			
·	- 9.1	+ 9.1	+ 5.7		+ 2			
Appalachian Maryland	- 5.8	+ 9.1 + 5.8	+ 0.3	+ 0.9 + 0.7	+ 4			
Non-Appalachian Maryland	- 7.4		+ 3.2	+ 1.1				
Mississippi		+ 7.4	-		+ 3			
Appalachian Mississippi	- 8.3	+ 8.3	+ 4.4	+ 1.5	+ 2			
Non-Appalachian Mississippi	- 7.1	+ 7.1	+ 2.8	+ 1.0 + 1.3	+ 3			
New York	- 4.1	+ 4.1	- 1.1		+ 3			
Appalachian New York	- 4.7	+ 4.7	- 1.3	+ 1.8	+ 4			
Non-Appalachian New York	- 4.0	+ 4.0	- 1.1	+ 1.3	+ 3			
North Carolina	- 7.3	+ 7.3	+ 2.0	+ 1.4	+ 3			
Appalachian North Carolina	- 7.0	+ 7.0	+ 1.8	+ 1.4	+ 3			
Non-Appalachian North Carolina	- 7.4	+ 7.4	+ 2.1	+ 1.5	+ 3			
Ohio	- 6.1	+ 6.1	+ 1.2	+ 1.4	+ 3			
Appalachian Ohio	- 7.1	+ 7.1	+ 2.8	+ 1.5	+ 2			
Non-Appalachian Ohio	- 5.7	+ 5.7	+ 0.9	+ 1.3	+ 3			
Pennsylvania	- 6.5	+ 6.5	+ 1.5	+ 1.2	+ 3			
Appalachian Pennsylvania	- 6.5	+ 6.5	+ 1.7	+ 1.2	+ 3			
Non-Appalachian Pennsylvania	- 6.5	+ 6.5	+ 1.5	+ 1.0	+ 4			
South Carolina	- 7.3	+ 7.3	+ 2.4	+ 1.3	+ 3			
Appalachian South Carolina	- 7.3	+ 7.3	+ 2.0	+ 1.2	+ 4			
Non-Appalachian South Carolina	- 7.3	+ 7.3	+ 2.7	+ 1.4	+ 3			
Tennessee	- 8.1	+ 8.1	+ 3.3	+ 0.9	+ 3			
Appalachian Tennessee	- 8.0	+ 8.0	+ 3.9	+ 1.1	+ 3			
Non-Appalachian Tennessee	- 8.2	+ 8.2	+ 2.8	+ 0.9	+ 4			
Virginia	- 6.2	+ 6.2	+ 0.3	+ 1.2	+ 4			
Appalachian Virginia	- 9.4	+ 9.4	+ 4.9	+ 2.0	+ 2			
Non-Appalachian Virginia	- 5.5	+ 5.5	- 0.3	+ 1.1	+ 4			
West Virginia (entire state)	- 7.8	+ 7.8	+ 4.3	+ 0.9	+ 2			

Figure 5.7: Percentage Point Change in the Share of Persons Ages 25 and Over in the Appalachian Region With a High School Diploma or More, 2006-2010 to 2011-2015

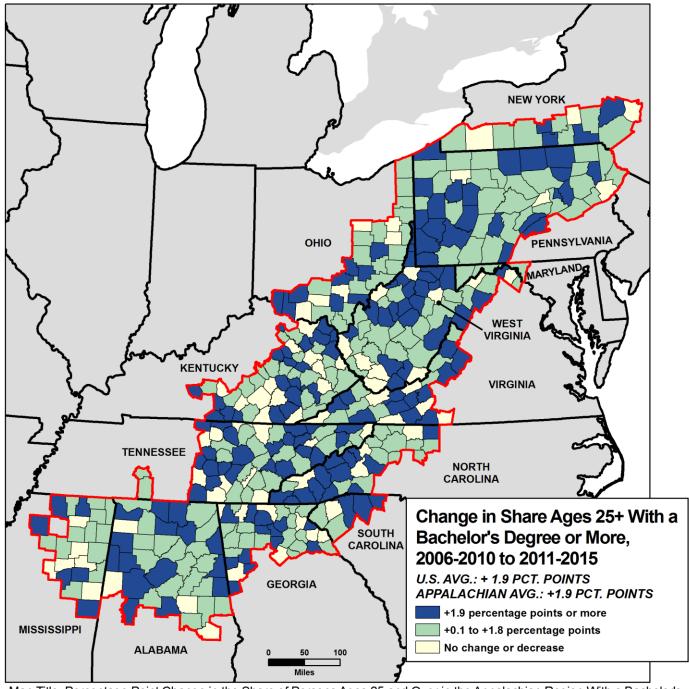


Map Title: Percentage Point Change in the Share of Persons Ages 25 and Over in the Appalachian Region With a High School Diploma or More, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Since the 2006-2010 period, the share of Appalachian adults who have completed high school or more has increased nearly three percentage points. This rise, which is close to a full percentage point above the national average, has continued a longstanding trend in the Region. And that increase has been even greater in some places: The share of adults with at least a high school diploma rose by more than four percentage points in the Appalachian counties of Kentucky and Virginia. In 94 Appalachian counties—mostly in Central, South Central, and Southern Appalachia—the share of adults with a high school diploma or more rose by at least five percentage points (almost three times the national average) between 2006-2010 and 2011-2015. In two-thirds of these 94 counties, however, less than 80 percent of adult residents have completed high school.

Figure 5.8: Percentage Point Change in the Share of Persons Ages 25 and Over in the Appalachian Region With a Bachelor's Degree or More, 2006-2010 to 2011-2015



Map Title: Percentage Point Change in the Share of Persons Ages 25 and Over in the Appalachian Region With a Bachelor's Degree or More, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

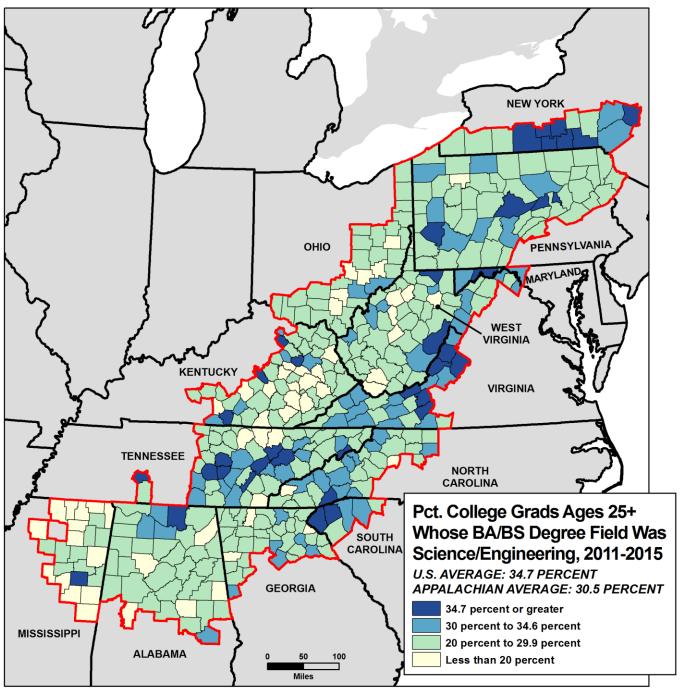
Although the percentage of Appalachian adults with at least a bachelor's degree is considerably lower than the national average, that share has been increasing. Both in Appalachia and nationwide, it was nearly two percentage points higher in 2011-2015 than it was in 2006-2010, suggesting a continued trend toward greater educational attainment among cohorts entering this age group. And in 166 of the Region's 420 counties (scattered throughout the Region), the increased share matched or exceeded the national average. Conversely, the share of adults with at least a four-year degree either remained the same or decreased in 75 counties. While counties in the latter group were likewise spread throughout the Region, nearly three-fourths of them were outside metropolitan areas.

Table 5.7: Bachelor's Degree Field (First Major) for Persons Ages 25 and Over in the Appalachian Region With a Bachelor's Degree or More, 2011-2015

	Total	Percent of	ee or More			
Bachelor's Degree Field (First Major)	Population Ages 25 and Over With a Bachelor's Degree or More, 2011-2015	Science and Engineering	Science- and Engineering- Related Fields	Business	Education	Arts, Humanities, and Other
United States	62,952,272	34.7	9.2	20.5	13.2	22.5
Appalachian Region	3,933,571	30.5	10.6	20.3	18.3	20.3
Subregions						
Northern Appalachia	1,374,048	31.4	11.1	18.2	18.8	20.4
North Central Appalachia	322,719	28.5	12.4	18.6	21.1	19.6
Central Appalachia	175,614	26.0	11.9	16.0	27.6	18.4
South Central Appalachia	768,041	31.8	10.3	18.9	16.8	22.2
Southern Appalachia	1,293,149	29.9	9.5	24.3	16.8	19.4
County Types	. ,					
Large Metros (pop. 1 million +)	1,210,960	31.6	10.0	23.8	14.5	20.0
Small Metros (pop. <1 million)	1,759,266	31.9	10.6	19.5	17.2	20.8
Nonmetro, Adjacent to Large Metros	250,293	26.3	11.5	17.5	24.8	20.0
Nonmetro, Adjacent to Small Metros	441,729	27.7	11.4	17.5	24.0	19.4
Rural (nonmetro, not adj. to a metro)	271,323	25.7	10.9	16.7	27.1	19.6
Alabama	761,650	29.1	10.2	23.4	17.8	19.5
Appalachian Alabama	502,562	29.8	10.0	23.9	16.8	19.5
Non-Appalachian Alabama	259,088	27.8	10.7	22.5	19.6	19.4
Georgia	1,873,484	31.9	8.7	24.6	13.8	21.0
Appalachian Georgia	513,901	30.3	9.2	26.0	15.5	19.1
Non-Appalachian Georgia	1,359,583	32.6	8.5	24.1	13.1	21.7
Kentucky	658,944	29.2	11.1	19.9	17.6	21.7
Appalachian Kentucky	113,117	24.8	12.0	14.9	28.3	19.9
Non-Appalachian Kentucky	545,827	30.1	10.9	21.0	15.4	22.6
Maryland	1,522,970	40.9	8.4	18.3	10.3	22.0
Appalachian Maryland	33,493	32.7	9.4	17.6	19.1	21.1
Non-Appalachian Maryland	1,489,477	41.1	8.4	18.4	10.2	21.1
Mississippi	401,000	24.9	11.9	21.8	22.4	19.0
Appalachian Mississippi	71,075	23.0	10.9	20.8	26.8	18.6
Non-Appalachian Mississippi	329,925	25.4 25.4	12.2	20.8	21.4	19.1
New York	4,596,124	34.2	8.6	18.9	11.8	26.5
Appalachian New York	175,680	36.3	9.4	12.5	18.9	22.9
Non-Appalachian New York	4,420,444	34.1	8.6	19.2	11.6	26.7
North Carolina	1,866,765	34.0	9.1	20.4	13.8	22.8
Appalachian North Carolina	298,470	31.1	10.4	17.4	16.3	24.8
Non-Appalachian North Carolina	1,568,295	31.1	8.8	20.9	13.3	24.6 22.4
Ohio	2,040,028	34.5 <b>30.7</b>	10.5	20.9 <b>21.6</b>	16.7	22.4 <b>20.4</b>
Appalachian Ohio	2,040,028	<b>30.7</b> 25.5	13.1	19.0	23.4	<b>20.4</b> 19.0
• •	1		13.1			
Non-Appalachian Ohio	1,806,926	31.4	10.2 <b>10.2</b>	21.9 <b>19.8</b>	15.9	20.6
Pennsylvania  Appalachian Pennsylvania	2,522,037	33.2		_	15.6	21.2
Appalachian Pennsylvania	1,018,335	31.5	11.2	19.0	18.1	20.2
Non-Appalachian Pennsylvania  South Carolina	1,503,702	34.3	9.5 <b>8.6</b>	20.4 <b>22.4</b>	13.9 <b>15.9</b>	21.9 <b>21.1</b>
	829,540	31.9				
Appalachian South Carolina	205,611	31.8	8.9	22.3	16.4	20.6
Non-Appalachian South Carolina	623,929	32.0	8.6	22.5	15.7	21.3
Tennessee	1,092,276	29.9	9.9	22.7	15.7	21.8
Appalachian Tennessee	417,508	31.3	10.7	20.5	17.8	19.8
Non-Appalachian Tennessee	674,768	29.1	9.4	24.0	14.4	23.0
Virginia	2,022,217	40.4	7.4	19.0	10.0	23.2
Appalachian Virginia	102,044	35.2	9.3	16.4	17.5	21.6
Non-Appalachian Virginia	1,920,173	40.7	7.3	19.2	9.6	23.3
West Virginia (entire state)	248,673	28.5	12.4	18.9	21.0	19.2

Note: Examples of "Science- and Engineering-Related Fields" include nursing, architecture, and mathematics teacher education. Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Figure 5.9: Among Persons Ages 25 and Over in the Appalachian Region With a Bachelor's Degree or More, Percent Whose Bachelor's Degree Field (First Major) Was Science and Engineering, 2011-2015



Map Title: Among Persons Ages 25 and Over in the Appalachian Region With a Bachelor's Degree or More, Percent Whose Bachelor's Degree Field (First Major) Was Science and Engineering, 2011-2015

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Among the 3.9 million adults in the Appalachian Region with a bachelor's degree or more, 31 percent held a degree in the science and engineering field—slightly lower than the national share of 35 percent. But there was much variation within the Region. In 38 Appalachian counties, for example, the share of BA/BS holders with science and engineering degrees matched or exceeded the national average. Yet in another 58 counties in the Region, less than one-fifth of adult college graduates had a science and engineering degree. Science and engineering jobs are becoming increasingly important in keeping the United States competitive in the global economy. The field of science and engineering includes the following detailed fields and majors: computers, mathematics, and statistics; biological, agricultural, and environmental sciences; physical and related science; psychology; social sciences; and engineering.

## TRENDS IN EDUCATION

- Since the 2006-2010 period, the share of Appalachian adults ages 25 and over with at least a high school diploma has risen nearly three percentage points, to 85 percent in 2011-2015 (see Tables 5.1 and 5.4). The increase is a full percentage point greater than the national average, placing the Region's high school completion prevalence almost equal to that of the country. Most of this increase is due to the rising share of adults attaining a bachelor's degree or more.
- Within the Region, the high school completion prevalence increased the most in Central Appalachia (an improvement of 4.6 percentage points) and in Appalachia's most rural counties (an increase of almost four points). With these improvements, the share of adults completing high school in these areas has surpassed 75 percent as of 2011-2015. The Appalachian sections of Kentucky and Virginia had the largest increases among the states—more than four percentage points each.
- The share of adults in the Region with at least a bachelor's degree also has increased since 2006-2010—in this case, by nearly two percentage points to 23 percent. The increase has been greatest in Northern, North Central, and South Central Appalachia, in metropolitan areas, and in the Appalachian portions of North Carolina, Pennsylvania, and Virginia. In Central Appalachia, the Region's most rural counties, and in Appalachian Kentucky, the improvement has been smaller.
- The pattern of improvement among working-age adults ages 25 to 64 has been similar to that for all adults, except that the overall improvement was about 1.5 percentage points for both high school and college completion (see Table 5.5). Central Appalachia, Appalachian Kentucky and Virginia, and the Region's most rural counties still had the greatest improvement in the share with at least a high school diploma. With the exception of Appalachian Virginia, these geographic areas (along with Appalachian New York) showed the smallest gains in the share with a bachelor's degree.
- The greatest improvement since 2006-2010 has been among adults ages 65 and over. The share of older adults in Appalachia with at least a high school diploma has risen seven percentage points; the share with at least a bachelor's degree has increased more than three points (see Table 5.6). Possible factors fueling this increase include both the influx of younger, more educated cohorts into the older ages, and the arrival of well-educated older adults moving into the Region upon retirement. Within Appalachia's subregions, county types, and states, the patterns of improvement that were present among working-age adults generally held among older adults as well. (In Appalachian Kentucky, for example, the share of older adults with at least a high school diploma rose more than 10 percentage points, while the share with a bachelor's degree or more only increased a little more than two points.)
- Even with the improvements cited above, however, it is important to note that regardless of age, the
  prevalence of four-year college completion among adults remains well below the U.S. average in
  many parts of the Region (see Tables 5.1 through 5.3). For example, the percentage of persons ages
  25 and over with a bachelor's degree or more was at least 10 percentage points below the national
  share in the Appalachian sections of six states (Kentucky, Maryland, Mississippi, Ohio, Virginia, and
  West Virginia).

# CHAPTER 6: LABOR FORCE, EMPLOYMENT, AND UNEMPLOYMENT

Table 6.1: Labor Force, Employment, and Unemployment Status of Persons Ages 25 to 64 in the Appalachian Region, 2011-2015

Labor Force, Employment, and Unemployment	Total Number of Civilian Persons	Total Persons Age Labor		Employment Rate (Pct. of Civ.	Civ. Rate (Pct. of Civ.	
Ollemployment	Ages 25-64	Number	Percent	Labor Force)		
United States	166,221,336	128,628,176	77.4	93.1	6.9	
Appalachian Region	13,249,550	9,633,971	72.7	93.1	6.9	
Subregions						
Northern Appalachia	4,334,729	3,272,321	75.5	93.9	6.1	
North Central Appalachia	1,273,464	879,297	69.0	93.3	6.7	
Central Appalachia	1,006,540	599,257	59.5	91.4	8.6	
South Central Appalachia	2,459,887	1,793,358	72.9	93.0	7.0	
Southern Appalachia	4,174,930	3,089,738	74.0	92.7	7.3	
County Types						
Large Metros (pop. 1 million +)	3,199,205	2,481,557	77.6	93.6	6.4	
Small Metros (pop. <1 million)	5,567,188	4,104,766	73.7	93.2	6.8	
Nonmetro, Adjacent to Large Metros	1,131,110	798,249	70.6	92.6	7.4	
Nonmetro, Adjacent to Small Metros	2,051,333	1,409,752	68.7	92.9	7.1	
Rural (nonmetro, not adj. to a metro)	1,300,714	839,647	64.6	92.1	7.9	
Alabama	2,509,959	1,792,354	71.4	92.5	7.5	
Appalachian Alabama	1,627,075	1,168,048	71.8	92.8	7.2	
Non-Appalachian Alabama	882,884	624,306	70.7	91.9	8.1	
Georgia	5,279,820	3,987,643	75.5	92.1	7.9	
Appalachian Georgia	1,611,190	1,235,977	76.7	92.8	7.2	
Non-Appalachian Georgia	3,668,630	2,751,666	75.0	91.9	8.1	
Kentucky	2,313,938	1,651,423	71.4	93.0	7.0	
Appalachian Kentucky	620,439	371,248	59.8	91.1	8.8	
Non-Appalachian Kentucky	1,693,499	1,280,175	75.6	93.5	6.5	
Maryland	3,209,593	2,632,406	82.0	93.9	6.1	
Appalachian Maryland	133,078	96,971	72.9	92.8	7.2	
Non-Appalachian Maryland	3,076,515	2,535,435	82.4	93.9	6.1	
Mississippi	1,519,861	1,083,225	71.3	91.9	8.1	
Appalachian Mississippi	312,902	220,846	70.6	92.0	8.0	
Non-Appalachian Mississippi	1,206,959	862,379	71.5	91.9	8.	
New York	10,602,049	8,294,305	78.2	93.1	6.9	
Appalachian New York	525,855	397,066	75.5	93.8	6.2	
Non-Appalachian New York	10,076,194	7,897,239	78.4	93.1	6.9	
North Carolina	5,131,946	3,920,330	76.4	92.3	7.7	
Appalachian North Carolina	884,515	649,167	73.4	92.5	7.5	
Non-Appalachian North Carolina	4,247,431	3,271,163	77.0	92.3	7.7	
Ohio	6,063,678	4,684,078	77.2	93.3	6.7	
Appalachian Ohio	1,051,525	750,560	71.4	92.9	7.1	
Non-Appalachian Ohio	5,012,153	3,933,518	78.5	93.4	6.6	
Pennsylvania	6,725,436	5,252,618	78.1	93.5	6.5	
Appalachian Pennsylvania	3,024,256	2,302,627	76.1	94.0	6.0	
Non-Appalachian Pennsylvania	3,701,180	2,949,991	79.7	93.1	6.9	
South Carolina	2,467,956	1,840,389	74.6	92.2	7.8	
Appalachian South Carolina	623,763	464,867	74.5	92.9	7.1	
Non-Appalachian South Carolina	1,844,193	1,375,522	74.6	92.0	8.0	
Tennessee	3,415,800	2,536,637	74.3	93.0	7.0	
Appalachian Tennessee	1,468,452	1,050,339	71.5	92.9	7.	
Non-Appalachian Tennessee	1,947,348	1,486,298	76.3	93.1	6.9	
Virginia	4,392,879	3,488,677	79.4	94.8	5.2	
Appalachian Virginia	388,393	266,174	68.5	93.7	6.:	
Non-Appalachian Virginia	4,004,486	3,222,503	80.5	94.9	5.	
West Virginia (entire state)	978,107	660,081	67.5	93.5	6.9	

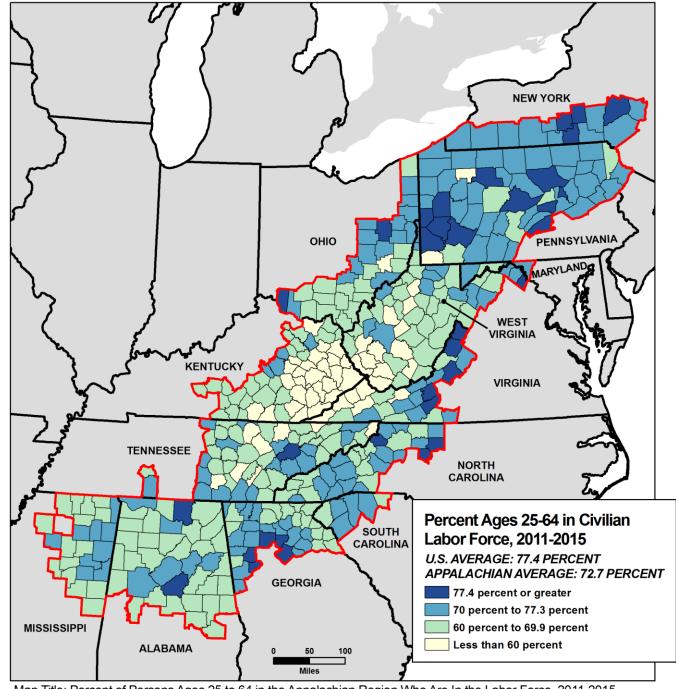


Figure 6.1: Percent of Persons Ages 25 to 64 in the Appalachian Region Who Are In the Labor Force, 2011-2015

Map Title: Percent of Persons Ages 25 to 64 in the Appalachian Region Who Are In the Labor Force, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In the 2011-2015 period, 73 percent of Appalachia's civilian population in the prime working ages (ages 25 to 64) were in the civilian labor force, slightly below the U.S. average of 77 percent. In 34 Appalachian counties (26 of which were in metropolitan areas), the share was at or above the national average, yet there were 55 counties where less than 60 percent of 25-to-64-year-olds were in the civilian labor force. Nearly all the counties in the latter group were outside of metropolitan areas, and 41 were in Central Appalachia. Indeed, just 60 percent of working-age residents in Central Appalachia and 65 percent of those in the most isolated rural areas were in the labor force. And there are indications of a possible connection between educational attainment and labor force participation. For example, in 29 of the 34 counties where labor force participation levels were at or above the national rate, the share of working-age adults with at least a high school diploma also matched or exceeded the U.S. average.

**NEW YORK** PENNSYLVANIA оню WEST VIRGINIA VIRGINIA TENNESSEE **NORTH CAROLINA Employment Rate, Civilian LF** SOUTH Participants Ages 25-64, 2011-2015 CAROLINA U.S. AVERAGE: 93.1 PERCENT APPALACHIAN AVERAGE: 93.1 PERCENT **GEORGIA** 95 percent or greater 93.1 percent to 94.9 percent

Figure 6.2: Employment Rate for Civilian Labor Force Participants Ages 25 to 64 in the Appalachian Region, 2011-2015

Map Title: Employment Rate for Civilian Labor Force Participants Ages 25 to 64 in the Appalachian Region, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

**MISSISSIPPI** 

**ALABAMA** 

The employment rate in Appalachia among members of the civilian labor force ages 25 to 64 was identical to the national rate during the 2011-2015 period. Although there were only slight differences among subregions and urban/rural county types, there was some variation at the county level. In nearly half of Appalachian counties, the employment rate matched or exceeded the national average, with 41 counties having employment rates of 95 percent or greater. (Two states, Pennsylvania and Virginia, accounted for 21 of those 41 counties.) Yet in 54 counties in the Region (48 of which were in Central, South Central, and Southern Appalachia), employment among 25-to-64-year-olds was less than 90 percent, which suggests that these areas may not have fully recovered economically from the recent recession. Four-fifths of the counties in the latter group were outside metropolitan areas.

90 percent to 93 percent Less than 90 percent

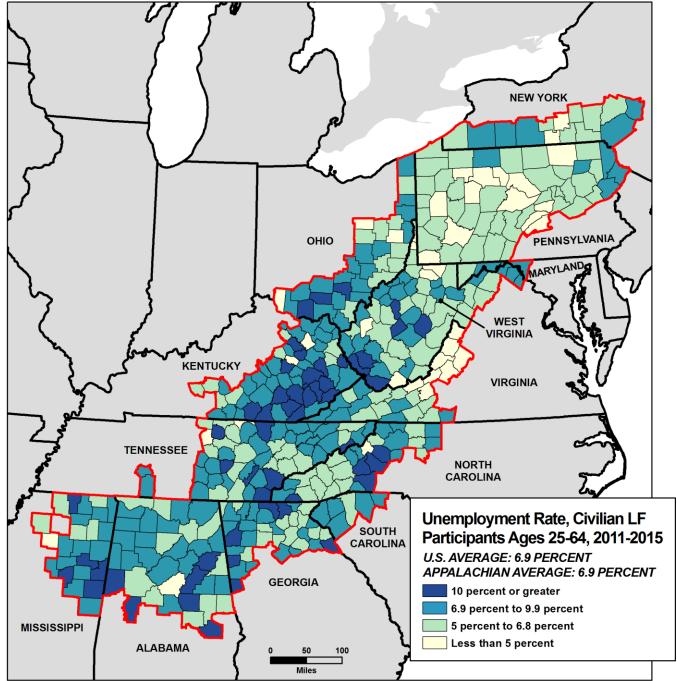


Figure 6.3: Unemployment Rate for Civilian Labor Force Participants Ages 25 to 64 in the Appalachian Region, 2011-2015

Map Title: Unemployment Rate for Civilian Labor Force Participants Ages 25 to 64 in the Appalachian Region, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Unemployment in the Appalachian Region among persons ages 25 to 64 matched the national average of 6.9 percent during the 2011-2015 period. Within Appalachia, the jobless rate was at least 10 percent in 54 counties—42 of which were outside metropolitan areas and 48 of which were in Central, South Central, and Southern Appalachia. Conversely, the unemployment rate was less than 5 percent in 39 other counties, with 29 of these located in New York, Pennsylvania, Virginia, and West Virginia—the states whose Appalachian sections had the lowest jobless levels. (All of West Virginia lies in Appalachia.) There are indications of a connection between unemployment and educational attainment: In 52 of the 54 Appalachian counties with double-digit unemployment, the share of 25-to-64-year-olds with at least a high school diploma was below the national average; in 27 of these counties, the share was less than four-fifths.

Table 6.2: Percentage Point Change in Labor Force, Employment, and Unemployment Status of Persons Ages 25 to 64 in the Appalachian Region, 2006-2010 to 2011-2015

	Percentage Point Change					
Labor Force, Employment, and Unemployment	Labor Force Participation Rate	Employment Rate (Pct. of Civ. Labor Force)	Unemployment Rate (Pct. of Civ. Labor Force)			
United States	- 0.6	- 0.5	+ 0.5			
Appalachian Region	- 1.1	- 0.4	+ 0.4			
Subregions						
Northern Appalachia	- 0.7	- 0.1	+ 0.1			
North Central Appalachia	- 1.1	- 0.3	+ 0.3			
Central Appalachia	- 1.4	- 1.3	+ 1.3			
South Central Appalachia	- 1.6	- 0.2	+ 0.2			
Southern Appalachia	- 1.4	- 0.4	+ 0.4			
County Types						
Large Metros (pop. 1 million +)	- 0.6	- 0.1	+ 0.1			
Small Metros (pop. <1 million)	- 1.1	- 0.5	+ 0.5			
Nonmetro, Adjacent to Large Metros	- 2.1	- 0.2	+ 0.2			
Nonmetro, Adjacent to Small Metros	- 2.0	- 0.2	+ 0.2			
Rural (nonmetro, not adj. to a metro)	- 1.1	- 0.8	+ 0.8			
Alabama	- 1.6	- 0.8	+ 0.8			
Appalachian Alabama	- 1.6	- 0.6	+ 0.6			
Non-Appalachian Alabama	- 1.5	- 1.1	+ 1.1			
Georgia	- 1.5	- 0.8	+ 0.8			
Appalachian Georgia	- 1.6	- 0.4	+ 0.4			
Non-Appalachian Georgia	- 1.5	- 0.9	+ 0.9			
Kentucky	- 0.6	- 0.3	+ 0.3			
Appalachian Kentucky	- 1.4	- 1.3	+ 1.3			
Non-Appalachian Kentucky	- 0.6	- 0.1	+ 0.1			
Maryland	- 0.3	- 1.0	+ 1.0			
Appalachian Maryland	- 1.3	- 1.5	+ 1.5			
Non-Appalachian Maryland	- 0.3	- 1.1	+ 1.1			
Mississippi	- 0.9	- 0.9	+ 0.9			
Appalachian Mississippi	- 0.6	+ 0.0	+ 0.0			
Non-Appalachian Mississippi	- 0.9	- 1.1	+ 1.1			
New York	+ 0.2	- 0.8	+ 0.8			
Appalachian New York	- 1.8	- 0.4	+ 0.4			
Non-Appalachian New York	+ 0.3	- 0.8	+ 0.8			
North Carolina	- 1.0	- 0.5	+ 0.5			
Appalachian North Carolina	- 2.2	- 0.6	+ 0.6			
Non-Appalachian North Carolina	- 0.8	- 0.5	+ 0.5			
Ohio	- 1.1	+ 0.3	- 0.3			
Appalachian Ohio	- 1.3	+ 0.6	- 0.6			
Non-Appalachian Ohio	- 1.0	+ 0.3	- 0.3			
Pennsylvania	- 0.2	- 0.7	+ 0.7			
Appalachian Pennsylvania	- 0.4	- 0.3	+ 0.3			
Non-Appalachian Pennsylvania	- 0.1	- 1.1	+ 1.1			
South Carolina	- 0.8	- 0.2	+ 0.2			
Appalachian South Carolina	- 0.9	+ 0.4	- 0.4			
Non-Appalachian South Carolina	- 0.9	- 0.4	+ 0.4			
Tennessee	- 1.0	+ 0.0	+ 0.0			
Appalachian Tennessee	- 1.3	- 0.1	+ 0.1			
Non-Appalachian Tennessee	- 0.9	+ 0.2	- 0.2			
Virginia	+ 0.0	- 0.7	+ 0.7			
Appalachian Virginia	- 1.1	- 0.3	+ 0.3			
Non-Appalachian Virginia	+ 0.1	- 0.7	+ 0.7			
West Virginia (entire state)	- 0.7	- 0.9	+ 0.9			

**NEW YORK** PENNSYLVANIA OHIO **WEST** VIRGINIA VIRGINIA TENNESSEE **NORTH CAROLINA** Change in Share Ages 25-64 in Civilian Labor Force, SOUTH **CAROLINA** 2006-2010 to 2011-2015 U.S. AVG.: -0.6 PCT. POINTS **GEORGIA** APPALACHIAN AVG.: -1.1 PCT. POINTS +2 percentage points or more

Figure 6.4: Percentage Point Change in the Share of Persons Ages 25 to 64 in the Appalachian Region Who Are In the Labor Force, 2006-2010 to 2011-2015

Map Title: Percentage Point Change in the Share of Persons Ages 25 to 64 in the Appalachian Region Who Are In the Labor Force, 2006-2010 to 2011-2015

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Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

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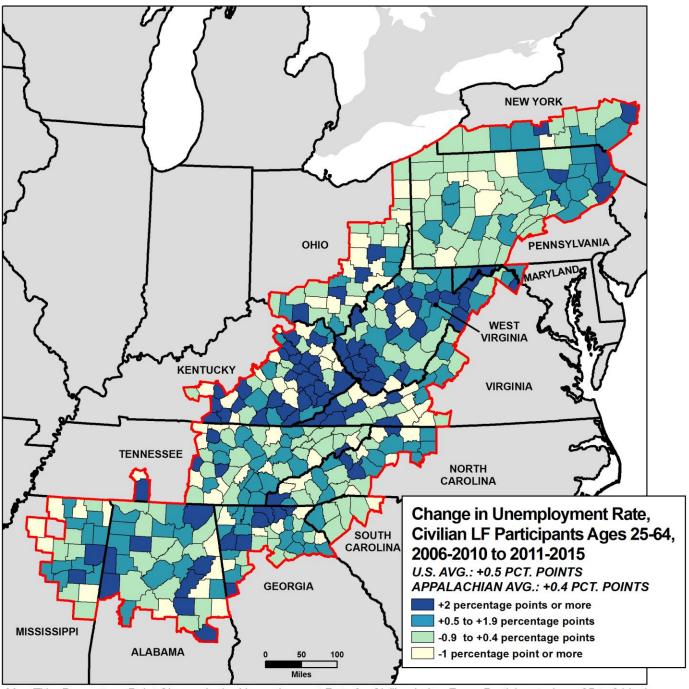
Between 2006-2010 and 2011-2015, the labor force participation rate among civilians ages 25 to 64 fell by just over a full percentage point in the Appalachian Region, compared with 0.6 percentage points for the nation as a whole. The decline was present in most of the Region—two in three Appalachian counties had labor force rate decreases greater than or equal to the U.S. average. And in 47 counties (mostly in Central, South Central, and Southern Appalachia), the labor force participation rate among working-age adults was at least five percentage points lower than in 2006-2010. But participation rates did increase in some parts of Appalachia; in fact, there were 39 counties in the Region where the share of adults in the labor force rose by at least two percentage points. More than half of the counties in this latter group were in three states—Kentucky, Virginia, and West Virginia.

-0.5 to +1.9 percentage points

-4.9 to -0.6 percentage points

-5 percentage points or more

Figure 6.5: Percentage Point Change in the Unemployment Rate for Civilian Labor Force Participants Ages 25 to 64 in the Appalachian Region, 2006-2010 to 2011-2015



Map Title: Percentage Point Change in the Unemployment Rate for Civilian Labor Force Participants Ages 25 to 64 in the Appalachian Region, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Unemployment among civilian labor force participants rose by about half a percentage point between 2006-2010 and 2011-2015, both in Appalachia and nationwide. Indeed, the unemployment rate rose by at least 0.5 percentage points in nearly half of the Region's 420 counties, and by at least two points in 89 of them. (Most of these counties were in North Central, Central, and Southern Appalachia.) Given that the 2006-2010 period includes years prior to the "Great Recession" of 2007-2009, and that the 2011-2015 period covers the recession's aftermath, this suggests that employment has not yet fully recovered from the economic downturn. There were some pockets of recovery, however: In 85 Appalachian counties, the unemployment rate in 2011-2015 was at least a full percentage point lower than it was in 2006-2010.

## TRENDS IN LABOR FORCE, EMPLOYMENT, AND UNEMPLOYMENT

- Among working-age adults (ages 25 to 64), Appalachia's labor force participation rate in 2011-2015 was nearly 73 percent, more than a full percentage point lower than its rate in 2006-2010 (see Tables 6.1 and 6.2). The decline was even greater in South Central Appalachia (where the labor force participation rate fell 1.6 percentage points) and nonmetropolitan counties bordering metro areas (where the rates fell two percentage points).
- Within the civilian labor force, the employment rate in Appalachia was slightly more than 93 percent, which was about half a percentage point lower than the employment rate in 2006-2010. Among the subregions, the size of the decline was similar—ranging from a negligible dip in Northern Appalachia to a 1.3 percentage point decline in Central Appalachia. Elsewhere in the Region, the employment rate fell nearly a full percentage point (0.8 points) among the most rural Appalachian counties. The greatest variation was among the states: Employment increased slightly in Appalachian Ohio and South Carolina, stayed the same in Mississippi, and fell by more than a full percentage point in both Kentucky's and Maryland's Appalachian counties.
- As Appalachia's employment rate fell between 2006-2010 and 2011-2015, its unemployment rate
  rose. The Region's unemployment rate of 6.9 percent in the later period is nearly half a percentage
  point above its rate from the earlier period.
- The lower labor force and employment rates in 2011-2015 for both Appalachia and the United States (and thus the higher unemployment rates) suggest that labor force and employment levels may not yet have rebounded from the economic downturn of 2007-2009.

# **CHAPTER 7: INCOME AND POVERTY**

Table 7.1: Household, Family, and Per Capita Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015

Incomo	Household Inco (2015 D	•	Family Incom (2015 D	ne, 2011-2015 Dollars)	Per Capita Income,
Income	Mean HH Income	Median HH Income	Mean Family Income	Median Family Income	2011-2015 (2015 Dollars)
United States	75,558	53,889	88,153	66,011	28,930
Appalachian Region	60,525	44,744	71,740	56,520	24,302
Subregions					
Northern Appalachia	63,137	47,883	76,100	61,182	26,053
North Central Appalachia	57,621	43,063	68,397	54,767	23,408
Central Appalachia	47,534	34,105	56,075	43,584	19,21
South Central Appalachia	57,709	41,843	68,862	53,267	23,83
Southern Appalachia	63,620	47,152	73,861	57,633	24,23
County Types					
Large Metros (pop. 1 million +)	72,032	54,385	84,862	67,337	28,24
Small Metros (pop. <1 million)	61,240	45,355	73,266	57,830	24,77
Nonmetro, Adjacent to Large Metros	54,110	41,259	63,683	51,638	21,64
Nonmetro, Adjacent to Small Metros	52,776	39,974	61,919	49,976	21,49
Rural (nonmetro, not adj. to a metro)	48,884	35,908	57,741	45,541	19,75
Alabama	60,511	43,623	71,994	55,341	24,09
Appalachian Alabama	62,309	44,985	73,901	57,062	24,81
Non-Appalachian Alabama	57,271	41,586	68,461	53,280	22,80
Georgia	69,010	49,620	79,648	59,410	25,73
Appalachian Georgia	69,185	53,182	77,557	61,256	24,60
Non-Appalachian Georgia	68,939	48,139	80,625	58,664	26,23
Kentucky	60,031	43,740	71,153	55,367	24,06
Appalachian Kentucky	46,798	33,492	55,167	42,901	18,78
Non-Appalachian Kentucky	64,871	48,225	77,249	61,035	25,99
Maryland	97,801	74,551	113,668	90,089	36,89
Appalachian Maryland	64,921	49,806	76,819	62,511	25,29
Non-Appalachian Maryland	99,330	76,164	115,349	92,143	37,41
Mississippi	54,906	39,665	64,296	49,274	21,05
Appalachian Mississippi	49,865	36,449	58,573	45,634	19,60
Non-Appalachian Mississippi	56,301	40,655	65,877	50,422	21,44
New York	86,825	59,269	100,948	71,913	33,23
Appalachian New York	61,364	47,101	74,114	60,620	24,92
Non-Appalachian New York	88,379	60,354	102,530	73,068	33,70
North Carolina	65,338	46,868	77,040	57,856	25,92
Appalachian North Carolina	56,723	41,327	67,714	52,498	23,58
Non-Appalachian North Carolina	67,266	48,392	79,076	59,445	26,41
Ohio	66,409	49,429	79,891	62,817	26,95
Appalachian Ohio	56,503	43,411	66,729	54,997	22,74
Non-Appalachian Ohio	68,479	50,909	82,776	65,309	27,84
Pennsylvania	73,175	53,599	87,959	68,158	29,29
Appalachian Pennsylvania	65,013	49,160	78,619	62,961	26,95
Non-Appalachian Pennsylvania	80,401	58,761	96,034	73,927	31,21
South Carolina	61,987	45,483	72,700	56,343	24,60
Appalachian South Carolina	61,520	45,180	72,563	57,070	24,21
Non-Appalachian South Carolina	62,146	45,626	72,747	56,541	24,73
Tennessee	63,339	45,219	74,677	56,110	25,22
Appalachian Tennessee	57,634	41,411	68,285	52,467	23,61
Non-Appalachian Tennessee	68,006	48,902	79,935	59,976	26,46
Virginia	88,955	65,015	102,966	78,390	34,15
Appalachian Virginia	54,352	39,769	65,795	51,708	22,61
Non-Appalachian Virginia	92,803	69,178	106,943	82,833	35,32
West Virginia (entire state)	56,425	41,751	67,421	52,866	23,45

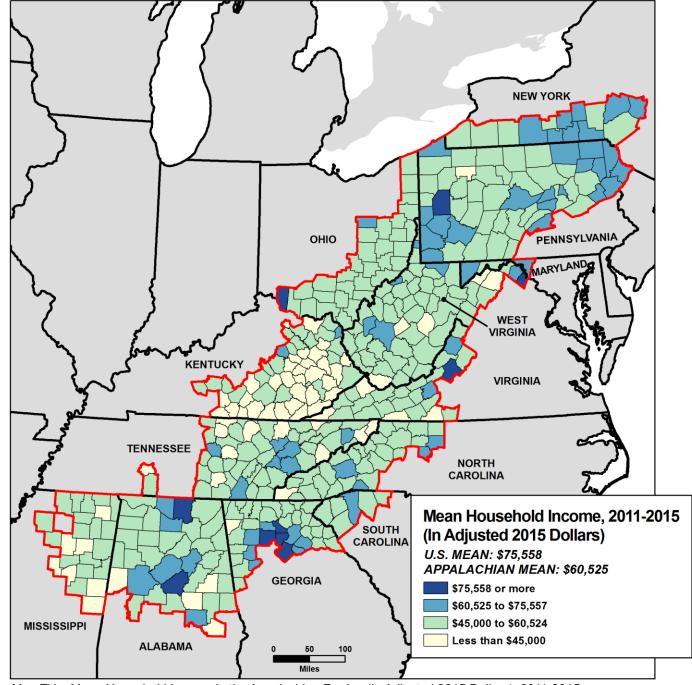


Figure 7.1: Mean Household Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015

Map Title: Mean Household Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In the 2011-2015 period, the mean income of Appalachian households was \$60,525, just 80 percent of the U.S. average (\$75,558). In just 10 of the Region's counties (all of which were in metropolitan areas), average household income matched or exceeded that of the nation as a whole. And in only 65 other counties (49 of which were in metros), mean household income matched or surpassed the Appalachian average. In contrast, mean household income was less than \$45,000 in 66 counties—60 of which were outside metro areas, and 40 of which were in Central Appalachia (32 in Kentucky alone).

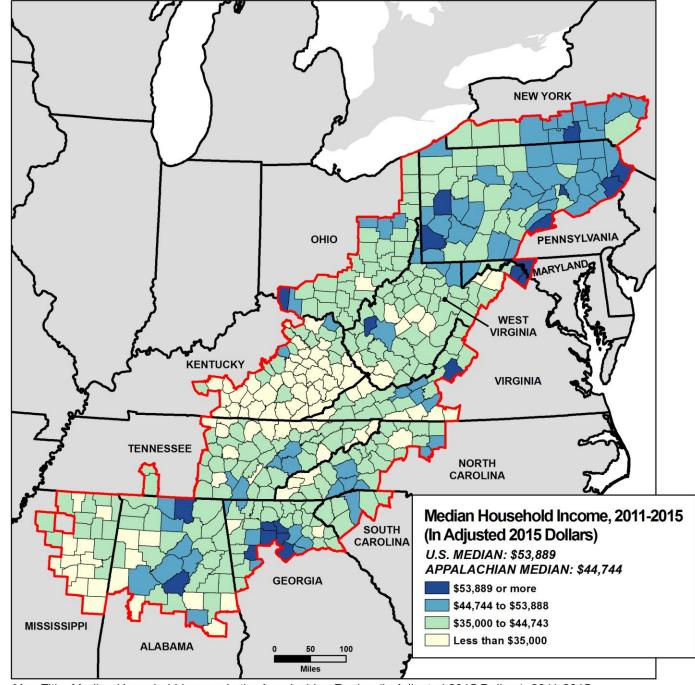


Figure 7.2: Median Household Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015

Map Title: Median Household Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

At \$44,744, median household income in Appalachia (the level at which half the households have higher incomes and the other half have lower incomes) was 83 percent that of the United States (\$53,889) during the 2011-2015 period. There were 21 counties in the Region (all of which were in metropolitan areas) that had household incomes at or above the national median, while another 77 had incomes at or above the regional median. On the other hand, 97 counties in the Region had median household incomes below \$35,000—87 of which were outside metro areas and 53 of which were in Central Appalachia. This distribution is not surprising: median household income was \$35,908 for the most rural counties and \$34,105 for Central Appalachia. It is useful to note that the income levels displayed here reflect income received in the years following the end of the 2007-2009 economic downturn.

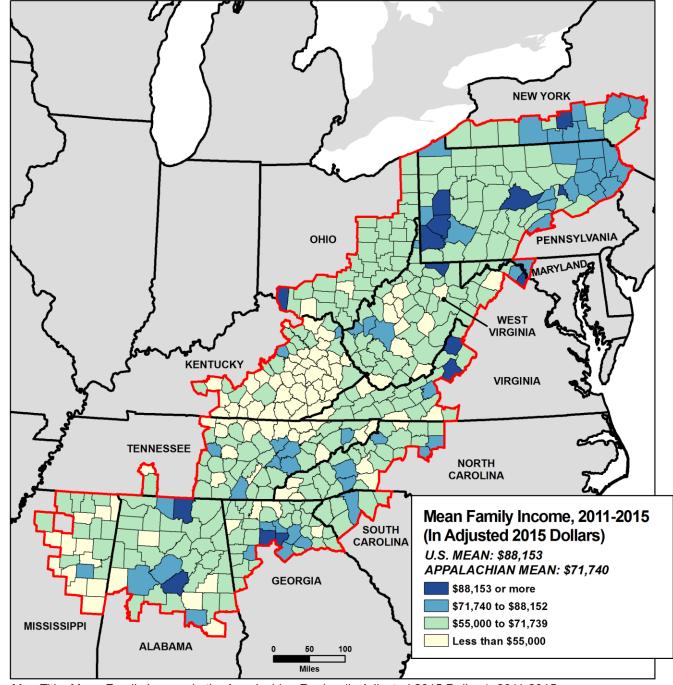


Figure 7.3: Mean Family Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015

Map Title: Mean Family Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In just 15 Appalachian counties (all but one of which were in metropolitan areas), the average income of families matched or surpassed the U.S. mean of \$88,153 for the 2011-2015 period. And there were only an additional 56 counties (44 of which were part of metro areas) where mean family income was equal to or greater than the average for the Appalachian Region (\$71,740). In contrast, mean family income was less than \$55,000 in 100 Appalachian counties. All but 11 of these counties were outside metropolitan areas, while more than half were in Central Appalachia and 38 were in Kentucky alone. Overall, mean family income over the 2011-2015 period was less than \$64,000 for each of the three nonmetro county types, just \$56,075 for Central Appalachia, and \$55,167 for Appalachian Kentucky.

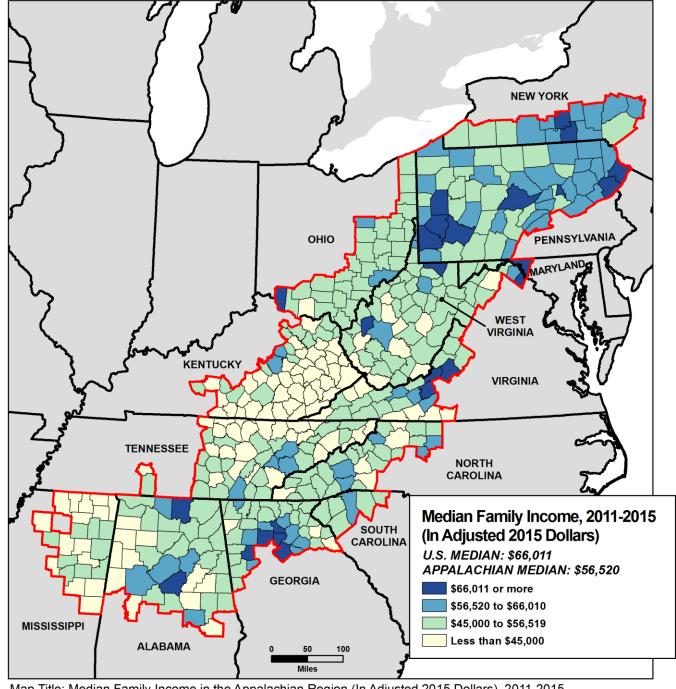


Figure 7.4: Median Family Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015

Map Title: Median Family Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In 25 Appalachian counties—all of which were in metro areas—median family income (the level where half of all families have higher incomes while the other half have lower incomes) matched or exceeded the U.S. median of \$66,011 during the 2011-2015 period. In another 67 counties (41 of which were in metros), median income was at or above the median for families in the Appalachian Region (\$56,520). In contrast, median family income was less than \$45,000 in 115 counties. Of the counties in this latter group, almost half were rural counties not adjacent to a metro area (median family income in those counties as a whole was \$45,541), and 38 were in Appalachian Kentucky (where median family income was \$42,901). It is important to note that the 2011-2015 period covers a period of relatively slow economic recovery following the recession of 2007-2009.

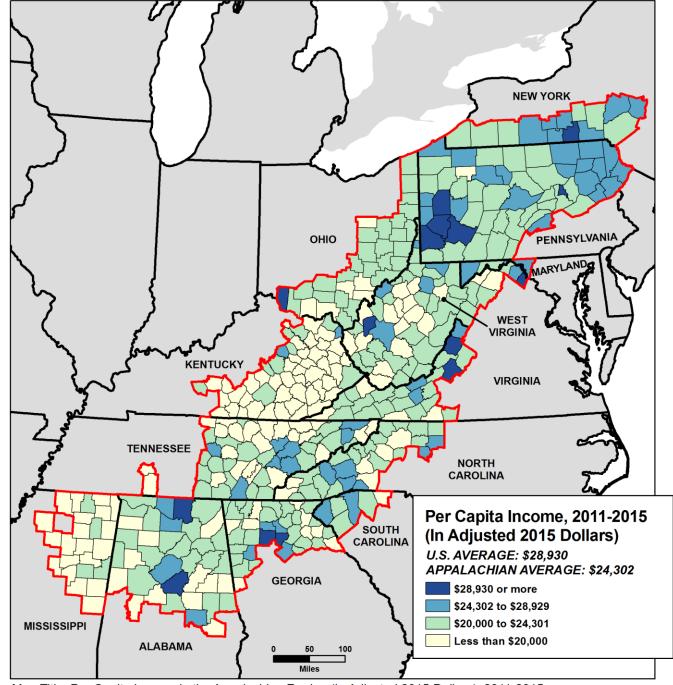


Figure 7.5: Per Capita Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015

Map Title: Per Capita Income in the Appalachian Region (In Adjusted 2015 Dollars), 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

At \$24,302, per capita income in the Appalachian Region was 84 percent that of the U.S. average of \$28,930 during the 2011-2015 period. And there was considerable variation within the Region. Per capita income was the same or higher than the national average in 15 Appalachian counties, including Pittsburgh, suburban Atlanta, and Clermont County, Ohio (which is part of metropolitan Cincinnati). In 63 other counties, per capita income was at or above the regional average; while nearly half of these were in Northern Appalachia, there were pockets in the South Central and Southern subregions. Yet in 142 Appalachian counties, per capita income was less than \$20,000. As with other income measures, most of the counties with the highest per capita incomes were in metro areas, while the ones with the lowest were disproportionately in rural areas, particularly in Central Appalachia. Indeed, per capita income in 2011-2015 was only \$19,759 in the most rural Appalachian counties as a whole, and just \$19,216 in Central Appalachia.

Table 7.2: Change in Household, Family, and Per Capita Income in the Appalachian Region (In Adjusted 2015 Dollars), 2006-2010 to 2011-2015

Income	Percent Change Income (In 20		Percent Char Income (in 2	Percent Change in Per	
Income	Mean HH Income	Median HH Income	Mean Family Income	Median Family Income	Capita Income (In 2015 Dollars)
United States	- 1.9	- 4.5	- 1.6	- 3.6	- 2.6
Appalachian Region	- 1.4	- 3.2	- 1.1	- 2.3	- 1.4
Subregions					
Northern Appalachia	+ 1.2	+ 0.1	+ 1.9	+ 0.8	+ 2.2
North Central Appalachia	+ 0.6	- 1.2	+ 0.8	- 0.2	+ 0.8
Central Appalachia	- 1.0	- 2.8	- 0.8	- 2.1	- 0.8
South Central Appalachia	- 2.7	- 5.0	- 2.5	- 4.1	- 3.1
Southern Appalachia	- 4.1	- 5.3	- 4.0	- 5.1	- 4.9
County Types					
Large Metros (pop. 1 million +)	- 2.1	- 2.9	- 2.0	- 2.6	- 2.5
Small Metros (pop. <1 million)	- 1.8	- 3.6	- 1.3	- 2.9	- 2.1
Nonmetro, Adjacent to Large Metros	- 0.6	- 3.0	+ 0.1	- 1.5	+ 0.0
Nonmetro, Adjacent to Small Metros	- 0.2	- 2.3	- 0.3	- 1.9	+ 1.8
Rural (nonmetro, not adj. to a metro)	- 1.6	- 1.5	- 1.5	- 1.5	- 1.6
Alabama	- 3.5	- 4.6	- 3.0	- 3.7	- 3.6
Appalachian Alabama	- 3.8	- 4.9	- 3.6	- 4.1	- 4.0
Non-Appalachian Alabama	- 2.8	- 3.9	- 1.9	- 2.1	- 2.7
Georgia	- 4.7	- 7.5	- 4.5	- 7.0	- 5.8
Appalachian Georgia	- 5.4	- 7.2	- 5.1	- 7.1	- 6.8
Non-Appalachian Georgia	- 4.4	- 7.7	- 4.2	- 7.1	- 5.4
Kentucky	- 1.4	- 3.2	- 1.1	- 2.1	- 1.7
Appalachian Kentucky	- 2.7	- 2.3	- 2.8	- 1.4	- 2.0
Non-Appalachian Kentucky	- 1.1	- 2.6	- 0.7	- 2.0	- 1.9
Maryland	- 1.6	- 2.9	- 2.0	- 2.6	- 2.6
Appalachian Maryland	- 3.1	- 4.0	- 3.2	- 4.4	- 5.2
Non-Appalachian Maryland	- 1.6	- 2.8	- 2.0	- 2.7	- 2.6
Mississippi	- 3.8	- 3.7	- 3.1	- 3.6	- 3.0
Appalachian Mississippi	- 1.5	- 1.0	- 1.6	- 1.9	- 0.9
Non-Appalachian Mississippi	- 4.3	- 4.9	- 3.5	- 4.3	- 3.6
New York	- 0.6	- 1.9	- 0.3	- 1.9	- 1.2
Appalachian New York	- 0.6	- 2.8	+ 0.7	+ 0.0	- 0.5
Non-Appalachian New York	- 0.7	- 2.6	- 0.4	- 2.2	- 1.3
North Carolina	- 2.7	- 5.4	- 2.4	- 5.2	- 3.6
Appalachian North Carolina	- 4.9	- 6.8	- 4.6	- 6.5	- 5.4
Non-Appalachian North Carolina	- 2.4	- 4.9	- 2.1	- 4.9	- 3.4
Ohio	- 1.8	- 4.0	- 0.9	- 3.2	- 1.3
Appalachian Ohio	- 1.0	- 2.6	- 0.2	- 0.6	- 0.2
Non-Appalachian Ohio	- 2.0	- 4.3	- 1.1	- 3.1	- 1.5
Pennsylvania	+ 0.0	- 2.2	+ 0.3	- 1.1	- 0.4
Appalachian Pennsylvania	+ 2.0	+ 1.3	+ 2.5	+ 1.7	+ 3.4
Non-Appalachian Pennsylvania	- 1.4	- 4.2	- 1.5	- 3.8	- 2.4
South Carolina	- 3.3	- 4.8	- 3.3	- 4.4	- 3.5
Appalachian South Carolina	- 3.4	- 5.0	- 3.7	- 4.4	- 4.4
Non-Appalachian South Carolina	- 3.2	- 4.7	- 3.2	- 4.2	- 3.1
Tennessee	- 1.6	- 4.0	- 1.5	- 3.1	- 2.2
Appalachian Tennessee	- 1.7	- 4.3	- 1.9	- 3.1	- 2.4
Non-Appalachian Tennessee	- 1.7	- 3.2	- 1.3	- 3.4	- 2.1
Virginia	- 0.9	- 2.6	- 1.0	- 1.9	- 2.3
Appalachian Virginia	+ 1.7	- 2.8	+ 3.4	- 0.4	+ 2.0
Non-Appalachian Virginia	- 1.3	- 2.6	- 1.6	- 2.2	- 2.8
West Virginia (entire state)	+ 1.6	+ 0.1	+ 2.0	- 0.5	+ 1.6

**NEW YORK** PENNSYLVANIA OHIO WEST VIRGINIA VIRGINIA TENNESSEE NORTH CAROLINA Change in Median Household Income (Adjusted 2015 Dollars), SOUTH CAROLINA 2006-2010 to 2011-2015 U.S. AVERAGE: -4.5 PERCENT APPALACHIAN AVERAGE: -3.2 PERCENT **GEORGIA** Increase -4.4 percent to 0 percent MISSISSIPPI -9.9 percent to -4.5 percent **ALABAMA** -10 percent or more Miles

Figure 7.6: Percent Change in Median Household Income in the Appalachian Region (In Adjusted 2015 Dollars), 2006-2010 to 2011-2015

Map Title: Percent Change in Median Household Income in the Appalachian Region (In Adjusted 2015 Dollars), 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Adjusting for inflation, the median income for Appalachian households (the level where half of all households have higher incomes while the other half have lower incomes) was 3 percent lower in 2011-2015 than it was in 2006-2010, suggesting that incomes have not yet fully recovered from the recent economic downturn. While the decline was not as steep in Appalachia as in the nation as a whole, that was not the case in much of the Region: In 170 counties, real median household income fell at or above the national rate; the decline was at least 10 percent in 52 counties. Most of the counties with the sharpest declines were in South Central or Southern Appalachia. On a brighter note, however, there were 143 Appalachian counties where median household income actually rose between 2006-2010 and 2011-2015. While half of these counties were in Northern and North Central Appalachia, the rest were scattered throughout the Region.

Table 7.3: Number of Persons in the Appalachian Region in Poverty, by Age Group, 2011-2015

			Ages 18-64			
Poverty Status	All Ages	Under Age 18	Total	Ages 18-24	Ages 25-64	Ages 65 and Over
United States	47,749,043	15,760,766	27,929,918	7,070,659	20,859,259	4,058,359
Appalachian Region	4,219,279	1,324,825	2,511,394	608,124	1,903,270	383,060
Subregions						
Northern Appalachia	1,163,596	352,630	697,371	187,809	509,562	113,595
North Central Appalachia	421,638	123,614	262,165	64,899	197,266	35,859
Central Appalachia	449,533	135,257	269,905	49,056	220,849	44,371
South Central Appalachia	849,493	252,981	515,551	134,027	381,524	80,961
Southern Appalachia	1,335,019	460,343	766,402	172,333	594,069	108,274
County Types						
Large Metros (pop. 1 million +)	799,903	264,161	466,119	103,087	363,032	69,623
Small Metros (pop. <1 million)	1,751,722	542,909	1,059,361	285,578	773,783	149,452
Nonmetro, Adjacent to Large Metros	407,752	130,303	241,210	58,682	182,528	36,239
Nonmetro, Adjacent to Small Metros	708,138	220,938	413,459	84,788	328,671	73,741
Rural (nonmetro, not adj. to a metro)	551,764	166,514	331,245	75,989	255,256	54,005
Alabama	887,260	299,077	513,170	125,712	387,458	75,013
Appalachian Alabama	531,115	179,414	306,396	69,696	236,700	45,305
Non-Appalachian Alabama	356,145	119,663	206,774	56,016	150,758	29,708
Georgia	1,788,947	638,884	1,027,361	248,226	779,135	122,702
Appalachian Georgia	461,383	166,180	261,450	50,253	211,197	33,753
Non-Appalachian Georgia	1,327,564	472,704	765,911	197,973	567,938	88,949
Kentucky	805,841	259,193	476,074	109,806	366,268	70,574
Appalachian Kentucky	293,236	88,048	176,376	34,029	142,347	28,812
Non-Appalachian Kentucky	512,605	171,145	299,698	75,777	223,921	41,762
Maryland	576,805	176,322	343,050	81,655	261,395	57,433
Appalachian Maryland	33,636	10,730	19,453	4,871	14,582	3,453
Non-Appalachian Maryland	543,169	165,592	323,597	76,784	246,813	53,980
Mississippi	651,545	230,604	365,966	90,006	275,960	54,975
Appalachian Mississippi	139,237	47,339	79,652	22,490	57,162	12,246
Non-Appalachian Mississippi	512,308	183,265	286,314	67,516	218,798	42,729
New York	3,005,943	929,921	1,762,879	402,037	1,360,842	313,143
Appalachian New York	168,049	48,111	107,116	35,398	71,718	12,822
Non-Appalachian New York	2,837,894	881,810	1,655,763	366,639	1,289,124	300,321
North Carolina	1,667,465	557,005	976,882	245,865	731,017	133,578
Appalachian North Carolina	313,335	96,311	187,299	45,648	141,651	29,725
Non-Appalachian North Carolina	1,354,130	460,694	789,583	200,217	589,366	103,853
Ohio	1,775,836	595,193	1,046,761	264,287	782,474	133,882
Appalachian Ohio	348,278	114,968	204,657	44,414	160,243	28,653
Non-Appalachian Ohio	1,427,558	480,225	842,104	219,873	622,231	105,229
Pennsylvania	1,666,569	515,473	988,026	254,485	733,541	163,070
Appalachian Pennsylvania	757,187	222,998	454,490	124,712	329,778	79,699
Non-Appalachian Pennsylvania	909,382	292,475	533,536	129,773	403,763	83,371
South Carolina	830,901	279,791	481,367	117,900	363,467	69,743
Appalachian South Carolina	203,284	67,410	118,904	29,894	89,010	16,970
Non-Appalachian South Carolina	627,617	212,381	362,463	88,006	274,457	52,773
Tennessee	1,117,594	375,770	649,164	152,471	496,693	92,660
Appalachian Tennessee	508,665	155,369	304,311	69,825	234,486	48,985
Non-Appalachian Tennessee	608,929	220,401	344,853	82,646	262,207	43,675
Virginia	921,822	280,144	560,471	154,795	405,676	81,207
Appalachian Virginia	138,490	34,510	89,700	29,395	60,305	14,280
Non-Appalachian Virginia	783,332	245,634	470,771	125,400	345,371	66,927
West Virginia (entire state)	323,384	93,437	201,590	47,499	154,091	28,357

Note: Poverty status is determined by a series of income thresholds that are determined by family size and composition. In 2015, the poverty threshold for a family of two adults and two children was \$24,036. The poverty universe does not include unrelated individuals under age 15, people living in college dormitories, and people living in institutional group quarters.

Table 7.4: Percent of Persons in the Appalachian Region in Poverty, by Age Group, 2011-2015

Poverty Status	All Ages	Under Age 18	Ages 18-64			A
			Total	Ages 18-24	Ages 25-64	Ages 65 and Over
United States	15.5	21.7	14.5	25.1	12.7	9.4
Appalachian Region	17.1	24.4	16.5	28.3	14.6	9.5
Subregions						
Northern Appalachia	14.5	21.4	14.1	27.3	12.0	8.0
North Central Appalachia	18.0	24.5	18.0	31.8	15.8	9.3
Central Appalachia	24.4	33.4	23.8	32.2	22.5	14.7
South Central Appalachia	18.3	25.9	18.1	32.9	15.7	9.8
Southern Appalachia	17.1	24.2	15.9	24.8	14.4	10.1
County Types						
Large Metros (pop. 1 million +)	13.7	19.4	12.7	21.4	11.4	8.4
Small Metros (pop. <1 million)	16.9	24.1	16.5	30.0	14.1	8.8
Nonmetro, Adjacent to Large Metros	19.2	27.7	18.7	31.3	16.5	10.1
Nonmetro, Adjacent to Small Metros	18.4	26.9	17.8	27.2	16.4	10.4
Rural (nonmetro, not adj. to a metro)	22.6	31.2	22.3	35.4	20.1	12.8
Alabama	18.8	27.3	17.6	28.9	15.6	10.7
Appalachian Alabama	17.6	25.8	16.4	26.0	14.7	10.1
Non-Appalachian Alabama	21.0	29.7	19.9	33.7	17.2	11.8
Georgia	18.4	26.0	16.8	27.5	14.9	10.6
Appalachian Georgia	15.4	21.1	14.1	19.4	13.2	9.4
Non-Appalachian Georgia	19.7	28.3	18.0	30.7	15.7	11.1
Kentucky	18.9	26.1	17.9	29.0	16.1	11.6
Appalachian Kentucky	25.8	34.3	25.1	34.9	23.5	16.2
Non-Appalachian Kentucky	16.4	23.2	15.3	27.0	13.4	9.7
Maryland	10.0	13.3	9.3	16.3	8.2	7.5
Appalachian Maryland	14.3	21.0	13.5	23.4	11.8	8.6
Non-Appalachian Maryland	9.8	13.0	9.1	16.0	8.0	7.4
Mississippi	22.5	31.8	20.7	32.9	18.5	13.7
Appalachian Mississippi	22.8	32.0	21.5	36.7	18.4	13.3
Non-Appalachian Mississippi	22.5	31.8	20.5	31.8	18.5	13.8
New York	15.7	22.2	14.4	23.0	12.9	11.5
Appalachian New York	16.8	23.2	17.3	35.3	13.8	7.5
Non-Appalachian New York	15.6	22.2	14.2	22.2	12.9	11.8
North Carolina	17.4	24.7	16.3	28.6	14.3	9.8
Appalachian North Carolina	18.7	27.5	18.4	32.7	16.2	9.7
Non-Appalachian North Carolina	17.1	24.2	15.9	27.8	13.9	9.9
Ohio	15.8	22.8	15.0	27.0	13.1	8.0
Appalachian Ohio	17.8	26.1	17.2	27.1	15.6	8.8
Non-Appalachian Ohio	15.3	22.1	14.6	27.0	12.5	7.8
Pennsylvania	13.5	19.2	12.9	24.3	11.1	8.1
Appalachian Pennsylvania	13.6	19.8	13.3	26.6	11.1	8.0
Non-Appalachian Pennsylvania	13.3	18.8	12.5	22.4	11.0	8.3
South Carolina	17.9	26.3	16.8	28.2	14.9	9.8
Appalachian South Carolina	17.3	24.6	16.4	28.3	14.4	9.6
Non-Appalachian South Carolina	18.1	26.9	17.0	28.1	15.0	9.9
Tennessee	17.6	<b>25.6</b>	16.4	27.0	14.7	10.0
Appalachian Tennessee	18.5	26.3	18.0	29.5	16.1	10.3
Non-Appalachian Tennessee	17.0	25.1	15.3	25.2	13.6	9.8
Virginia	11.5	15.2	11.0	22.1	9.2	7.6
Appalachian Virginia	19.0	24.2	19.8	40.9	15.9	10.5
Non-Appalachian Virginia	19.0	14.5	19.6	20.0	8.6	7.1
West Virginia (entire state)	10.8 18.0	25.1	18.1	31.2	16.0	9.1

Note: Poverty status is determined by a series of income thresholds that are determined by family size and composition. In 2015, the poverty threshold for a family of two adults and two children was \$24,036. The poverty universe does not include unrelated individuals under age 15, people living in college dormitories, and people living in institutional group quarters.

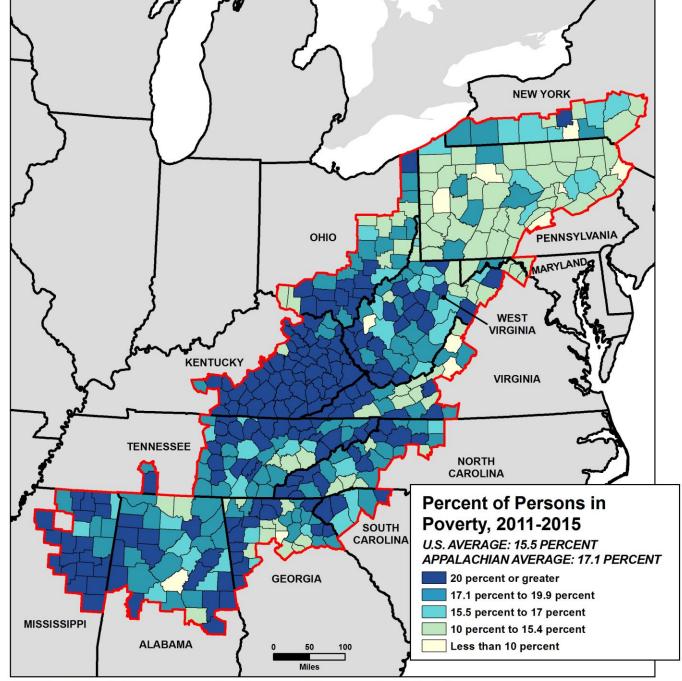


Figure 7.7: Percent of Persons in the Appalachian Region in Poverty, 2011-2015

Map Title: Percent of Persons in the Appalachian Region in Poverty, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Over the 2011-2015 period, 17 percent of Appalachian residents lived below the poverty level (income below \$24,036 for a family of two adults and two children in 2015)—close to two percentage points above the U.S. average. But there is a great deal of variation within the Region: In 174 counties, at least 20 percent of persons were poor, yet in another 102 counties the poverty rate was lower than the national average. And there was a geographic and urban/rural pattern: Four-fifths of the counties with poverty rates at or above 20 percent were outside metropolitan areas, and they were overwhelmingly in Central, South Central, and Southern Appalachia. In contrast, the counties where poverty stood below the U.S. rate were mostly in Northern Appalachia and in metropolitan areas.

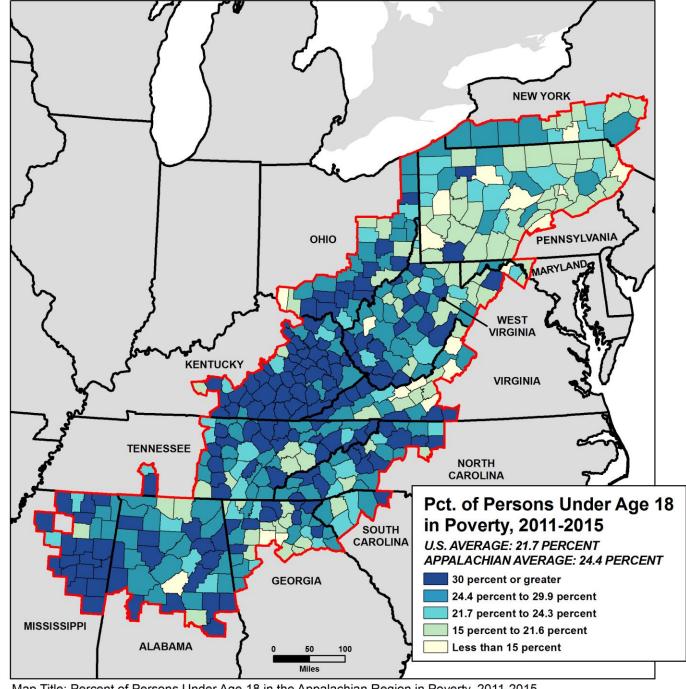


Figure 7.8: Percent of Persons Under Age 18 in the Appalachian Region in Poverty, 2011-2015

Map Title: Percent of Persons Under Age 18 in the Appalachian Region in Poverty, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Child poverty in the Appalachian Region exceeded 24 percent in 2011-2015—nearly three percentage points above the national rate. And the problem is even more acute in some parts of Appalachia. In 154 counties, at least 30 percent of children under age 18 lived below the poverty level (income below \$24,036 for a family of two adults and two children in 2015). These counties were primarily outside metropolitan areas, and many were in the most isolated rural areas. Central Appalachia was home to 61 of the counties with the highest poverty rates, while most of the rest were in South Central and Southern Appalachia. However, there were 103 counties (primarily in Northern Appalachia and in metropolitan areas) where child poverty rates were below the national average. Indeed, 15 of the 19 Appalachian counties where child poverty was less than 15 percent were in metro areas, and eight were in Northern Appalachia.

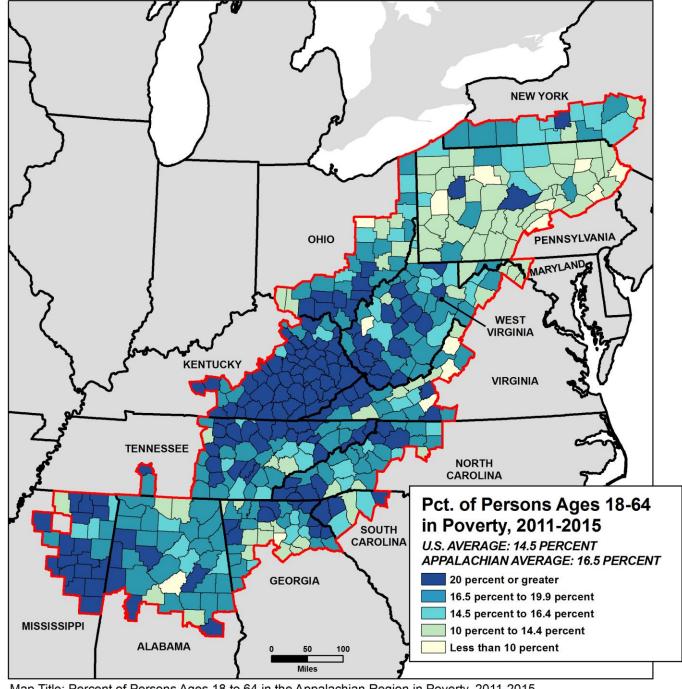


Figure 7.9: Percent of Persons Ages 18 to 64 in the Appalachian Region in Poverty, 2011-2015

Map Title: Percent of Persons Ages 18 to 64 in the Appalachian Region in Poverty, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Though at slightly lower levels, the poverty pattern among adults ages 18 to 64 in the Appalachian Region mirrored that for the overall population in the 2011-2015 period. Nearly 17 percent of Appalachian residents in this age group were below poverty (income of less than \$24,036 for a family of two adults and two children in 2015), and this rate was two percentage points above the U.S. average. Within the Region, there were rural/urban and geographic patterns of poverty concentration. Of the 149 counties where at least one in five 18-to-64-year-olds was poor, 125 were outside metropolitan areas; 127 were in Central, South Central, and Southern Appalachia; and 46 were in Kentucky alone. Conversely, all but a handful of the counties with rates below the national average were either in metro areas or in Northern Appalachia.

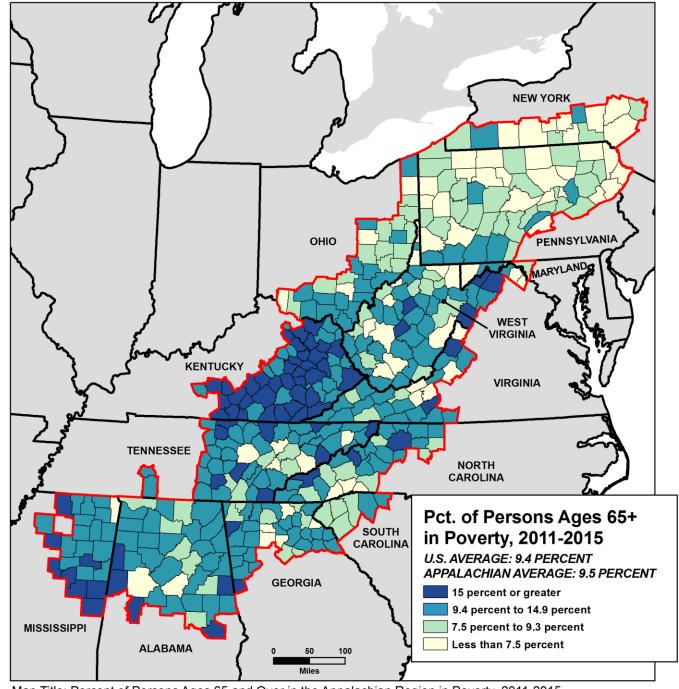


Figure 7.10: Percent of Persons Ages 65 and Over in the Appalachian Region in Poverty, 2011-2015

Map Title: Percent of Persons Ages 65 and Over in the Appalachian Region in Poverty, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

The poverty rate for older residents of Appalachia was just under 10 percent in 2011-2015, only slightly above the national average. Yet the rate was actually lower than the national average in 154 counties, almost half of which were in Northern Appalachia alone. But as with other age groups, poverty was especially prevalent among the senior population in Appalachian Kentucky, where nearly one in six older residents was poor in 2011-2015. Moreover, the state had more than half of Appalachia's 71 counties where the poverty rate among seniors was at least 15 percent. (Determined by a series of income thresholds based on family size and composition, the poverty level in 2015 was \$14,326 for a family of two adults headed by someone age 65 and over.)

Table 7.5: Percentage Point Change in the Share of Persons in the Appalachian Region in Poverty, by Age Group, 2006-2010 to 2011-2015

	Percentage Point Change in Share of Persons in Poverty							
Poverty Status		Under		Ages 18-64				
	All Ages	Age 18	Total	Ages 18-24	Ages 25-64	Ages 65 and Over		
United States	+ 1.7	+ 2.5	+ 1.9	+ 1.8	+ 2.0	- 0.		
Appalachian Region	+ 1.5	+ 2.9	+ 1.8	+ 1.2	+ 1.9	- 1.0		
Subregions								
Northern Appalachia	+ 1.0	+ 2.1	+ 1.3	+ 0.7	+ 1.4	- 0.6		
North Central Appalachia	+ 1.0	+ 1.4	+ 1.6	+ 0.5	+ 1.8	- 1.1		
Central Appalachia	+ 1.4	+ 3.0	+ 2.2	+ 1.5	+ 2.2	- 2.5		
South Central Appalachia	+ 1.9	+ 3.4	+ 2.5	+ 2.8	+ 2.4	- 0.9		
Southern Appalachia	+ 1.9	+ 3.5	+ 2.1	+ 1.0	+ 2.2	- 1.		
County Types								
Large Metros (pop. 1 million +)	+ 1.8	+ 3.2	+ 1.8	+ 1.1	+ 1.9	- 0.		
Small Metros (pop. <1 million)	+ 1.6	+ 3.0	+ 2.0	+ 0.7	+ 2.1	- 0.		
Nonmetro, Adjacent to Large Metros	+ 1.7	+ 3.2	+ 2.2	+ 1.6	+ 2.3	- 0.8		
Nonmetro, Adjacent to Small Metros	+ 1.1	+ 2.4	+ 1.6	+ 1.8	+ 1.6	- 1.5		
Rural (nonmetro, not adj. to a metro)	+ 1.1	+ 2.0	+ 2.0	+ 2.9	+ 1.8	- 2.		
Alabama	+ 1.7	+ 3.1	+ 2.1	+ 2.2	+ 2.1	- 0.9		
Appalachian Alabama	+ 1.8	+ 3.8	+ 1.9	+ 1.1	+ 2.0	- 0.8		
Non-Appalachian Alabama	+ 1.5	+ 1.6	+ 2.5	+ 4.0	+ 2.1	- 1.		
Georgia	+ 2.7	+ 4.5	+ 2.9	+ 2.2	+ 2.9	- 1.2		
Appalachian Georgia	+ 2.4	+ 4.0	+ 2.5	+ 0.8	+ 2.6	- 1.4		
Non-Appalachian Georgia	+ 2.4	+ 4.7	+ 3.1	+ 3.0	+ 3.1	- 1.· - 1.′		
Kentucky	+ 1.2	+ 4.7	+ 1.7	+ 0.9	+ 1.8	- 1.		
Appalachian Kentucky	+ 1.4	+ 2.2	+ 2.2	+ 2.1	+ 2.1	- 1. - 2.		
	+ 1.4	+ 2.2 + 1.7	+ 2.2	+ 2.1	+ 2.1	- 0.4		
Non-Appalachian Kentucky	+ 1.3	+ 1.7	+ 1.5	+ 0.6	+ 1.7	- 0.4 - 0.4		
Maryland								
Appalachian Maryland	+ 2.5	+ 5.2	+ 2.4	+ 3.3	+ 2.2	- 0.6		
Non-Appalachian Maryland	+ 1.4	+ 2.3	+ 1.4	+ 0.1	+ 1.6	- 0.4		
Mississippi	+ 1.3	+ 1.5	+ 2.0	+ 2.0	+ 2.1	- 1.		
Appalachian Mississippi	+ 0.1	- 0.3	+ 1.3	+ 2.0	+ 1.0	- 3.		
Non-Appalachian Mississippi	+ 1.7	+ 2.0	+ 2.2	+ 2.0	+ 2.4	- 0.5		
New York	+ 1.5	+ 2.3	+ 1.8	+ 1.8	+ 1.7	+ 0.0		
Appalachian New York	+ 1.8	+ 3.0	+ 2.5	+ 1.8	+ 2.4	- 1.0		
Non-Appalachian New York	+ 1.5	+ 2.3	+ 1.7	+ 1.8	+ 1.7	+ 0.		
North Carolina	+ 1.9	+ 3.1	+ 2.2	+ 1.9	+ 2.2	- 0.9		
Appalachian North Carolina	+ 2.6	+ 5.1	+ 3.2	+ 4.1	+ 3.1	- 1.1		
Non-Appalachian North Carolina	+ 1.7	+ 2.7	+ 2.0	+ 1.4	+ 2.1	- 0.8		
Ohio	+ 1.6	+ 2.6	+ 1.9	+ 1.8	+ 2.0	- 0.3		
Appalachian Ohio	+ 1.4	+ 2.4	+ 1.9	+ 1.1	+ 2.0	- 0.0		
Non-Appalachian Ohio	+ 1.6	+ 2.7	+ 2.0	+ 1.9	+ 1.9	- 0.2		
Pennsylvania	+ 1.1	+ 1.9	+ 1.4	+ 0.6	+ 1.6	- 0.		
Appalachian Pennsylvania	+ 0.8	+ 1.7	+ 1.2	+ 0.3	+ 1.2	- 0.0		
Non-Appalachian Pennsylvania	+ 1.3	+ 2.1	+ 1.5	+ 0.8	+ 1.8	- 0.3		
South Carolina	+ 1.5	+ 3.0	+ 2.0	+ 1.8	+ 2.0	- 1.		
Appalachian South Carolina	+ 2.1	+ 3.6	+ 2.2	+ 2.2	+ 2.1	- 0.		
Non-Appalachian South Carolina	+ 1.3	+ 2.8	+ 2.0	+ 1.6	+ 1.9	- 1.		
Tennessee	+ 1.1	+ 2.2	+ 1.5	+ 0.5	+ 1.7	- 1.		
Appalachian Tennessee	+ 1.6	+ 2.9	+ 2.0	+ 1.4	+ 2.0	- 1.		
Non-Appalachian Tennessee	+ 0.8	+ 1.6	+ 1.3	- 0.1	+ 1.4	- 1.		
Virginia	+ 1.2	+ 1.8	+ 1.5	+ 1.6	+ 1.5	- 0.		
Appalachian Virginia	+ 1.5	+ 1.8	+ 2.4	+ 3.5	+ 2.0	- 1.		
Non-Appalachian Virginia	+ 1.3	+ 1.9	+ 1.5	+ 1.4	+ 1.5	- 0.8		
West Virginia (entire state)	+ 0.6	+ 1.3	+ 1.2	- 0.3	+ 1.4	- 1.4		

Note: Poverty status is determined by a series of income thresholds that are determined by family size and composition. In 2015, the poverty threshold for a family of two adults and two children was \$24,036. The poverty universe does not include unrelated individuals under age 15, people living in college dormitories, and people living in institutional group quarters.

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

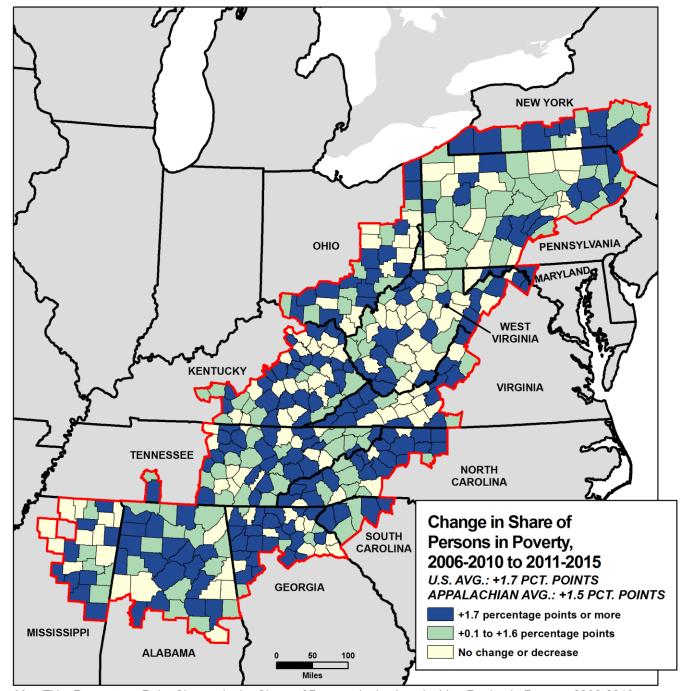


Figure 7.11: Percentage Point Change in the Share of Persons in the Appalachian Region in Poverty, 2006-2010 to 2011-2015

Map Title: Percentage Point Change in the Share of Persons in the Appalachian Region in Poverty, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

The share of Appalachian residents living below the poverty level (income of less than \$24,036 for a family of two adults and two children in 2015) increased about 1.5 percentage points between the 2006-2010 and 2011-2015 periods, slightly less than in the nation as a whole. Yet the rise in poverty was larger in much of the Region: In 184 of Appalachia's 420 counties, the percentage point increase in the poverty rate was at or above the national average. Although scattered throughout the Region, half of these counties were in South Central or Southern Appalachia. There was some good news in that 123 counties had poverty rates that either decreased or stayed the same between the two periods. Still, the overall picture suggests that in the aftermath of the Great Recession, poverty rates in many areas have not yet fallen back to pre-recession levels.

#### TRENDS IN INCOME AND POVERTY

- Adjusting for inflation, income levels in the Appalachian Region have fallen since the 2006-2010 period (see Tables 7.1 and 7.2).
  - Mean household income fell 1.4 percent to \$60,525 in 2011-2015. (All monetary figures are in 2015 dollars.)
  - Median household income (the level where half of all households have higher incomes while the other half have lower incomes) fell 3 percent to \$47,744.
  - Mean family income was down 1 percent to \$71,740.
  - Median family income (the level where half of all families have higher incomes while the other half have lower incomes) was down 2 percent to \$56,520.
  - Per capita income fell 1 percent to \$24,302.
- Yet the declines in income since 2006-2010 were not as severe in Appalachia as they were in the United States as a whole. (For example, median household income in the U.S. fell nearly 5 percent—more than a full percentage point more than in Appalachia.)
- Within the Appalachian Region, the declines in income were greatest in South Central and Southern Appalachia—and for each income measure, the drops were sharper than the national average. In contrast, some income measures actually rose in the other subregions. (For example, mean household and family income increased slightly in Northern and North Central Appalachia, even after adjusting for inflation.) Among the county types, counties in metropolitan areas had the greatest income declines—although the decreases were below the national average for the median income measures.
- Since 2006-2010, the share of Appalachian residents in poverty (incomes below \$24,036 for a family of two adults and two children in 2015) has risen 1.5 percentage points to 17.1 percent in 2011-2015 (see Tables 7.4 and 7.5). Poverty increased in all subregions and among all county types, with the greatest increases occurring in South Central and Southern Appalachia. The rise in poverty rates was especially high in the Appalachian portions of Georgia, Maryland, North Carolina, and South Carolina: Poverty increased more than two percentage points in each state.
- The increase in poverty was felt in every age group under age 65: Child poverty in Appalachia rose almost three percentage points (to 24 percent), and poverty among working-age adults increased nearly two percentage points. (And the overall patterns among subregions and county types generally held for both groups.) Although the rise in poverty among young adults (ages 18 to 24) was less than the national average, it was significantly higher in parts of Appalachia. The poverty rate for young adults increased almost three percentage points in Southern Appalachia and the Region's rural counties. And in the Appalachian sections of Maryland, North Carolina, and Virginia, the share of 18-to-24-year-olds in poverty was more than three percentage points higher in 2010-2015 than in 2006-2010. (The increase exceeded four percentage points in Appalachian North Carolina.)
- Yet poverty rates actually fell a full percentage point for older residents (ages 65 and over) between 2006-2010 and 2011-2015, and this decline was evident throughout the Appalachian Region. (Central Appalachia, the region's most rural areas, and the Appalachian portions of Kentucky and Mississippi had the biggest drops in the poverty rate for older persons.)
- Overall, the income and poverty trends in the Appalachian Region since 2006-2010 suggest that, for the most part, income and poverty levels have not yet returned to pre-recession levels—which in turn may highlight how slow the recovery has been.

## CHAPTER 8: HEALTH INSURANCE COVERAGE

Table 8.1: Number of Persons in the Appalachian Region Not Covered by Health Insurance, by Age Group, 2011-2015

Health Insurance Status	All Ages	Under Age 18	Ages 18-24	Ages 25-64	Ages 65 and Over
United States	40,446,231	4,756,380	6,550,794	28,725,272	413,785
Appalachian Region	3,003,026	315,359	481,137	2,189,360	17,170
Subregions					
Northern Appalachia	706,630	90,430	108,634	501,851	5,715
North Central Appalachia	265,346	21,647	45,031	197,602	1,066
Central Appalachia	241,014	21,115	41,241	177,776	882
South Central Appalachia	628,050	55,708	98,887	470,892	2,563
Southern Appalachia	1,161,986	126,459	187,344	841,239	6,944
County Types					
Large Metros (pop. 1 million +)	670,893	75,046	101,462	489,178	5,207
Small Metros (pop. <1 million)	1,223,509	114,648	200,181	902,434	6,246
Nonmetro, Adjacent to Large Metros	264,199	33,668	41,933	187,416	1,182
Nonmetro, Adjacent to Small Metros	501,343	54,010	78,297	366,261	2,775
Rural (nonmetro, not adj. to a metro)	343,082	37,987	59,264	244,071	1,760
Alabama	601,159	45,500	106,993	445,817	2,849
Appalachian Alabama	371,944	28,317	63,199	278,765	1,663
Non-Appalachian Alabama	229,215	17,183	43,794	167,052	1,186
Georgia	1,680,015	205,200	277,445	1,184,707	12,663
Appalachian Georgia	525,709	70,817	78,807	371,645	4,440
Non-Appalachian Georgia	1,154,306	134,383	198,638	813,062	8,223
Kentucky	490,262	53,065	86,162	349,050	1,98
Appalachian Kentucky	150,844	14,024	27,125	109,114	58
Non-Appalachian Kentucky	339,418	39,041	59,037	239,936	1,404
Maryland	523,072	52,573	76,482	384,201	9,810
Appalachian Maryland	19,898	2,228	2,901	14,507	262
Non-Appalachian Maryland	503,174	50,345	73,581	369,694	9,554
Mississippi	462,187	48,809	87,392	324,497	1,48
Appalachian Mississippi	92,641	7,767	18,534	66,151	18
Non-Appalachian Mississippi	369,546	41,042	68,858	258,346	1,30
New York	1,877,051	152,678	275,043	1,422,110	27,22
Appalachian New York	80,272	12,126	13,505	54,053	58
Non-Appalachian New York	1,796,779	140,552	261,538	1,368,057	26,63
North Carolina	1,390,162	140,018	219,792	1,022,814	7,53
Appalachian North Carolina	252,880	22,403	39,023	190,387	1,06
Non-Appalachian North Carolina	1,137,282	117,615	180,769	832,427	6,47
Ohio	1,108,605	133,174	172,333	794,561	8,53
Appalachian Ohio	226,816	32,231	34,619	158,021	1,94
Non-Appalachian Ohio	881,789	100,943	137,714	636,540	6,59
Pennsylvania	1,106,674	135,836	169,897	790,416	10,52
Appalachian Pennsylvania	460,560	52,735	70,804	333,657	3,364
Non-Appalachian Pennsylvania	646,114	83,101	99,093	456,759	7,16
South Carolina	680,185	70,056	107,951	498,421	3,75
Appalachian South Carolina	171,692	19,558	26,804	124,678	65
Non-Appalachian South Carolina	508,493	50,498	81,147	373,743	3,10
Tennessee	819,113	77,854	126,831	610,099	4,32
Appalachian Tennessee	351,617	30,322	54,240	265,653	1,40
Non-Appalachian Tennessee	467,496	47,532	72,591	344,446	2,92
Virginia	916,040	102,291	145,820	657,249	10,68
Appalachian Virginia	89,374	7,860	15,920	65,245	34
Non-Appalachian Virginia	826,666	94,431	129,900	592,004	10,33
West Virginia (entire state)	208,779	14,971	35,656	157,484	668

Note: The health insurance universe consists of the civilian noninstitutional population.

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Table 8.2: Percent of Persons in the Appalachian Region Not Covered by Health Insurance, by Age Group, 2011-2015

Health Insurance Status	All Ages	Under Age 18	Ages 18-24	Ages 25-64	Ages 65 and Over
United States	13.0	6.5	21.4	17.5	1.0
Appalachian Region	12.0	5.7	19.8	16.8	0.4
Subregions					
Northern Appalachia	8.7	5.4	13.3	11.8	0.4
North Central Appalachia	11.1	4.2	19.7	15.8	0.3
Central Appalachia	13.0	5.1	25.0	18.1	0.3
South Central Appalachia	13.3	5.6	21.2	19.3	0.3
Southern Appalachia	14.7	6.6	24.9	20.4	0.6
County Types					
Large Metros (pop. 1 million +)	11.4	5.4	19.5	15.4	0.6
Small Metros (pop. <1 million)	11.6	5.0	18.1	16.5	0.4
Nonmetro, Adjacent to Large Metros	12.3	7.0	19.7	17.0	0.3
Nonmetro, Adjacent to Small Metros	12.9	6.5	22.5	18.3	0.4
Rural (nonmetro, not adj. to a metro)	13.8	7.0	24.0	19.2	0.4
Alabama	12.7	4.1	22.8	18.0	0.4
Appalachian Alabama	12.2	4.0	21.6	17.4	0.4
Non-Appalachian Alabama	13.5	4.2	24.8	19.3	0.5
Georgia	17.1	8.2	28.5	22.8	1.1
Appalachian Georgia	17.4	8.9	29.3	23.3	1.2
Non-Appalachian Georgia	17.0	7.9	28.1	22.6	1.0
Kentucky	11.4	5.2	20.8	15.3	0.3
Appalachian Kentucky	13.1	5.4	25.0	18.0	0.3
Non-Appalachian Kentucky	10.7	5.2	19.3	14.4	0.3
Maryland	9.0	3.9	14.0	12.1	1.3
Appalachian Maryland	8.3	4.3	12.8	11.7	0.7
Non-Appalachian Maryland	9.0	3.9	14.1	12.1	1.3
Mississippi	15.8	6.7	29.1	21.8	0.4
Appalachian Mississippi	15.0	5.2	27.0	21.4	0.2
Non-Appalachian Mississippi	16.1	7.0	29.8	22.0	0.4
New York	9.7	3.6	14.1	13.5	1.0
Appalachian New York	7.7	5.7	9.8	10.4	0.3
Non-Appalachian New York	9.8	3.5	14.4	13.7	1.0
North Carolina	14.4	6.1	23.5	20.2	0.6
Appalachian North Carolina	14.9 14.3	6.3 6.1	24.7 23.3	21.7 19.8	0.3
Non-Appalachian North Carolina Ohio	9.7	5.0	23.3 15.9	13.3	0.6 <b>0.5</b>
	11.4	7.2	19.5	15.4	
Appalachian Ohio	9.4	7.2 4.6	15.2	12.8	0.6 0.5
Non-Appalachian Ohio Pennsylvania	8.8	5.0	13.9	11.9	0.5
Appalachian Pennsylvania	8.2	4.6	12.8	11.3	0.3
				11.3	
Non-Appalachian Pennsylvania  South Carolina	9.3 <b>14.5</b>	5.3 <b>6.5</b>	14.8 <b>23.4</b>	20.5	0.7 <b>0.5</b>
	14.3		21.9	20.2	
Appalachian South Carolina Non-Appalachian South Carolina	14.3	7.0 6.3	21.9	20.2	0.4 0.6
Tennessee	12.8	5.2	24.0 20.7	20.6 <b>18.1</b>	0.6
Appalachian Tennessee	12.6	5.0	20.7	18.3	0.3
Non-Appalachian Tennessee	13.0	5.0 5.3	20.7	17.9	0.3
Virginia	11.4	5.5	18.8	17.9 15.2	1.0
Appalachian Virginia	12.0	5.4	18.2	17.2	0.3
Non-Appalachian Virginia	11.3	5.4 5.5	18.9	17.2	1.1
West Virginia (entire state)	11.5	3.9	21.1	15.0 16.4	0.2

Note: The health insurance universe consists of the civilian noninstitutional population.

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

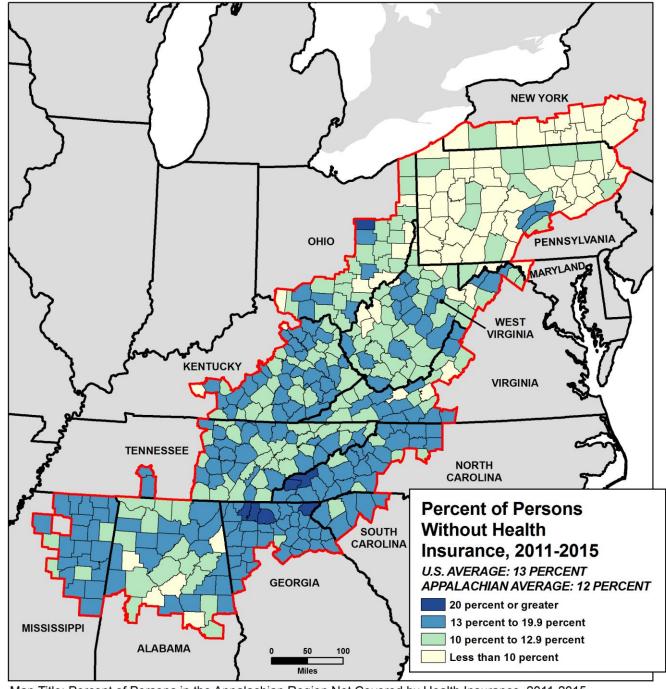
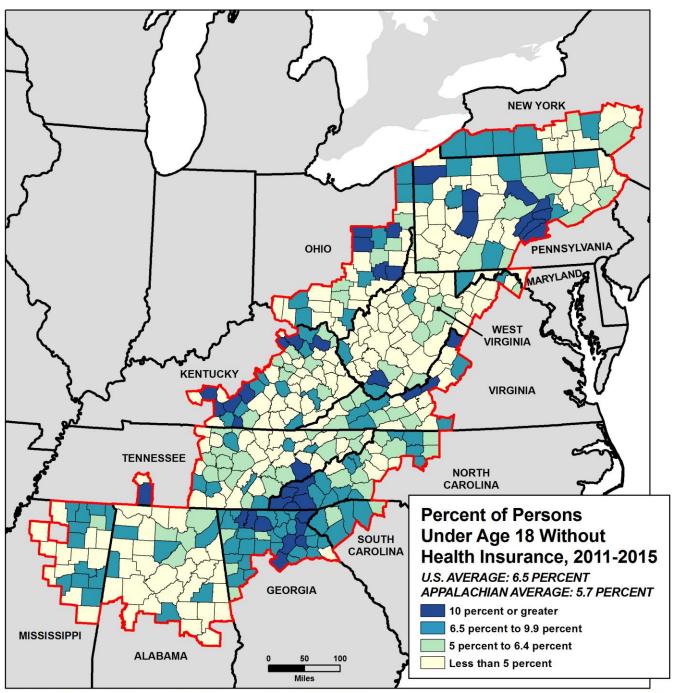


Figure 8.1: Percent of Persons in the Appalachian Region Not Covered by Health Insurance, 2011-2015

Map Title: Percent of Persons in the Appalachian Region Not Covered by Health Insurance, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Just over 3 million persons in the Appalachian Region were without any kind of health insurance coverage in the 2011-2015 period—a figure representing 12 percent of Appalachia's residents. Although the percentage for the Region is slightly lower than the U.S. share of 13 percent, almost half of the 420 Appalachian counties had non-coverage rates that matched or exceeded the national average. In seven Appalachian counties (including four in Georgia and two in North Carolina), at least one in five residents were not covered by insurance. Indeed, 17 percent of residents in Appalachian Georgia were not covered by health insurance. At the other end of the spectrum, 77 counties had uninsured rates below 10 percent, and 50 of these were in either New York or Pennsylvania—the states with the lowest percentages of uninsured residents in Appalachia.

Figure 8.2: Percent of Persons Under Age 18 in the Appalachian Region Not Covered by Health Insurance, 2011-2015



Map Title: Percent of Persons Under Age 18 in the Appalachian Region Not Covered by Health Insurance, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Just under 6 percent of Appalachia's children under age 18 were uninsured during 2011-2015, nearly a percentage point below the national average. But the rate varied throughout the Region. On one hand, 202 counties had non-coverage rates under 5 percent; these were spread geographically throughout the Region. Conversely, at least one in 10 children lacked health insurance in 41 other counties. All but a handful of counties in the latter group were outside metropolitan areas, and nearly half were in South Central or Southern Appalachia—with eight in Georgia alone.

OHIO PENNSYLVANIA

WEST
VIRGINIA

TENNESSEE

NORTH
CAROLINA

Figure 8.3: Percent of Persons Ages 18 to 24 in the Appalachian Region Not Covered by Health Insurance, 2011-2015

Map Title: Percent of Persons Ages 18 to 24 in the Appalachian Region Not Covered by Health Insurance, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

GEORGIA

Miles

MISSISSIPPI

**ALABAMA** 

SOUTH CAROLINA

Percent of Persons Ages 18-24 Without

U.S. AVERAGE: 21.4 PERCENT

30 percent or greater 21.4 percent to 29.9 percent

Less than 15 percent

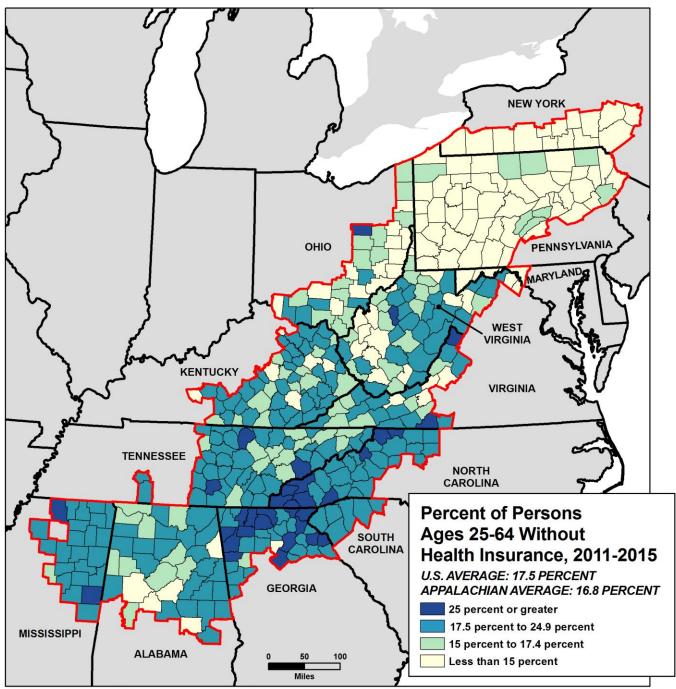
15 percent to 21.3 percent

Health Insurance, 2011-2015

APPALACHIAN AVERAGE: 19.8 PERCENT

Lack of health insurance coverage was highest among young adults—one-fifth of Appalachian residents ages 18 to 24 were uninsured during the 2011-2015 period. Although Appalachia's rate as a whole was slightly lower than the national average, the non-coverage problem was especially prevalent in much of Central and Southern Appalachia, as well as in the Region's most rural counties: In each of these three areas, one in four young adults was without coverage. This situation was especially dire in 114 counties, where non-coverage rates among 18-to-24-year-olds were 30 percent or higher. Among these counties, 98 were in Central, South Central, and Southern Appalachia, and 86 were outside metropolitan areas. In contrast, there were 68 Appalachian counties where less than 15 percent of young adults had no health insurance; all but a handful of these were in Northern Appalachia, in metro areas, and/or had a four-year college or university within their boundaries.

Figure 8.4: Percent of Persons Ages 25 to 64 in the Appalachian Region Not Covered by Health Insurance, 2011-2015



Map Title: Percent of Persons Ages 25 to 64 in the Appalachian Region Not Covered by Health Insurance, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In 2011-2015, 17 percent of Appalachia's working-age population were not covered by health insurance. While this rate was slightly below that for the nation, there was great variation within the Region. For example, more than one-fifth of 25-to-64-year-olds in the Appalachian sections of Georgia, Mississippi, North Carolina, and South Carolina were uninsured; the former three states accounted for 26 of the 33 counties with non-coverage rates of at least 25 percent for this age group. By comparison, there were 106 Appalachian counties where less than 15 percent of working-age residents were not insured; two-thirds of the counties in this latter group were in Northern Appalachia.

## **CHAPTER 9: DISABILITY STATUS**

Table 9.1: Number of Persons in the Appalachian Region With a Disability, by Age Group, 2011-2015

Disability Status	All Ages	Under Age 18	Total	Ages 18-34	Ages 35-64	Ages 65 and Over
United States	38,601,898	3,013,318	19,985,588	4,218,974	15,766,614	15,602,992
Appalachian Region	3,982,267	269,296	2,146,802	400,549	1,746,253	1,566,169
Subregions						
Northern Appalachia	1,211,191	91,184	614,455	124,131	490,324	505,552
North Central Appalachia	432,717	28,976	240,830	44,978	195,852	162,911
Central Appalachia	435,261	24,903	260,009	41,940	218,069	150,349
South Central Appalachia	783,078	48,316	415,692	74,171	341,521	319,070
Southern Appalachia	1,120,020	75,917	615,816	115,329	500,487	428,287
County Types						
Large Metros (pop. 1 million +)	753,738	56,493	400,373	78,625	321,748	296,872
Small Metros (pop. <1 million)	1,636,425	111,033	875,469	169,968	705,501	649,923
Nonmetro, Adjacent to Large Metros	361,236	25,492	195,942	35,615	160,327	139,802
Nonmetro, Adjacent to Small Metros	726,522	46,544	390,224	68,794	321,430	289,754
Rural (nonmetro, not adj. to a metro)	504,346	29,734	284,794	47,547	237,247	189,818
Alabama	772,482	51,827	427,176	80,818	346,358	293,479
Appalachian Alabama	489,046	30,776	271,738	50,610	221,128	186,532
Non-Appalachian Alabama	283,436	21,051	155,438	30,208	125,230	106,947
Georgia	1,197,714	96,107	664,355	135,404	528,951	437,252
Appalachian Georgia	349,733	27,290	190,381	37,543	152,838	132,062
Non-Appalachian Georgia	847,981	68,817	473,974	97,861	376,113	305,190
Kentucky	734,126	55,512	421,172	81,284	339,888	257,442
Appalachian Kentucky	266,587	16,610	160,683	27,103	133,580	89,294
Non-Appalachian Kentucky	467,539	38,902	260,489	54,181	206,308	168,148
Maryland	610,989	50,420	312,042	67,290	244,752	248,527
Appalachian Maryland	38,086	3,394	20,536	4,580	15,956	14,156
Non-Appalachian Maryland	572,903	47,026	291,506	62,710	228,796	234,371
Mississippi	477,699	33,439	265,291	49,106	216,185	178,969
Appalachian Mississippi	109,884	6,062	61,716	10,286	51,430	42,106
Non-Appalachian Mississippi	367,815	27,377	203,575	38,820	164,755	136,863
New York	2,159,439	159,565	1,075,396	227,218	848,178	924,478
Appalachian New York	148,267	12,150	78,073	18,145	59,928	58,044
Non-Appalachian New York	2,011,172	147,415	997,323	209,073	788,250	866,434
North Carolina	1,307,306	101,170	697,807	136,958	560,849	508,329
Appalachian North Carolina	262,657	16,904	133,887	23,540	110,347	111,866
Non-Appalachian North Carolina	1,044,649	84,266	563,920	113,418	450,502	396,463
Ohio	1,550,962	130,246	828,400	169,878	658,522	592,316
Appalachian Ohio	322,827	23,855	177,016	32,685	144,331	121,956
Non-Appalachian Ohio	1,228,135	106,391	651,384	137,193	514,191	470,360
Pennsylvania	1,696,250	138,758	862,720	185,554	677,166	694,772
Appalachian Pennsylvania	835,524	62,617	417,040	83,613	333,427	355,867
Non-Appalachian Pennsylvania	860,726	76,141	445,680	101,941	343,739	338,905
South Carolina	672,911	46,570	361,775	67,173	294,602	264,566
Appalachian South Carolina	171,357	11,789	91,981	16,890	75,091	67,587
Non-Appalachian South Carolina	501,554	34,781	269,794	50,283	219,511	196,979
Tennessee	979,250	67,736	544,262	104,303	439,959	367,252
Appalachian Tennessee	497,366	30,321	273,220	47,989	225,231	193,825
Non-Appalachian Tennessee	481,884	37,415	271,042	56,314	214,728	173,427
Virginia	897,300	69,094	464,695	98,785	365,910	363,511
Appalachian Virginia	137,284	6,406	74,435	12,654	61,781	56,443
Non-Appalachian Virginia	760,016	62,688	390,260	86,131	304,129	307,068
West Virginia (entire state)	353,649	21,122	196,096	34,911	161,185	136,431

Note: The ACS defines persons with a disability as having difficulty in at least one of the following six areas: hearing, vision, cognition, walking or climbing, self-care, or attending to the functions of independent living. The disability universe consists of the civilian noninstitutional population. Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Table 9.2: Percent of Persons in the Appalachian Region With a Disability, by Age Group, 2011-2015

				Ages 18-64		
Disability Status	All Ages	Under Age 18	Total	Ages 18-34	Ages 35-64	Ages 65 and Over
United States	12.4	4.1	10.3	5.8	12.9	36.0
Appalachian Region	15.9	4.9	13.9	7.5	17.3	39.0
Subregions						
Northern Appalachia	14.8	5.4	12.1	7.1	14.8	35.6
North Central Appalachia	18.2	5.6	16.3	8.9	20.2	42.0
Central Appalachia	23.4	6.0	22.7	11.2	28.3	49.8
South Central Appalachia	16.6	4.9	14.3	7.4	18.0	38.7
Southern Appalachia	14.2	3.9	12.6	6.6	15.9	39.8
County Types						
Large Metros (pop. 1 million +)	12.8	4.1	10.8	6.2	13.3	35.7
Small Metros (pop. <1 million)	15.5	4.9	13.3	7.2	16.7	38.4
Nonmetro, Adjacent to Large Metros	16.8	5.3	14.9	7.9	18.5	39.0
Nonmetro, Adjacent to Small Metros	18.6	5.6	16.6	9.0	20.3	40.9
Rural (nonmetro, not adj. to a metro)	20.3	5.5	18.8	9.1	23.9	45.1
Alabama	16.3	4.7	14.5	7.5	18.5	42.0
Appalachian Alabama	16.1	4.4	14.3	7.4	18.2	41.6
Non-Appalachian Alabama	16.6	5.2	14.9	7.7	19.2	42.5
Georgia	12.2	3.9	10.8	5.9	13.7	37.7
Appalachian Georgia	11.6	3.4	10.2	5.8	12.5	36.8
Non-Appalachian Georgia	12.5	4.1	11.0	5.9	14.2	38.1
Kentucky	17.0	5.5	15.7	8.5	19.7	42.2
Appalachian Kentucky	23.1	6.3	22.5	11.2	28.3	50.1
Non-Appalachian Kentucky	14.8	5.2	13.2	7.5	16.4	38.9
Maryland	10.5	3.7	8.4	5.0	10.3	32.4
Appalachian Maryland	16.0	6.5	14.0	9.2	16.6	35.3
Non-Appalachian Maryland	10.2	3.6	8.2	4.9	10.0	32.2
Mississippi	16.4	4.6	14.9	7.3	19.4	44.6
Appalachian Mississippi	17.7	4.1	16.3	7.2	21.8	45.8
Non-Appalachian Mississippi	16.0	4.7	14.5	7.3	18.8	44.2
New York	11.1	3.8	8.6	4.8	11.0	33.9
Appalachian New York	14.3	5.7	11.9	7.2	14.8	34.2
Non-Appalachian New York	10.9	3.7	8.5	4.7	10.7	33.9
North Carolina	13.5	4.4	11.6	6.3	14.6	37.4
Appalachian North Carolina	15.5	4.8	13.0	6.8	16.1	36.6
Non-Appalachian North Carolina	13.1	4.4	11.3	6.3	14.2	37.6
Ohio	13.6	4.9	11.7	6.8	14.4	35.3
Appalachian Ohio	16.3	5.3	14.7	8.2	17.9	37.6
Non-Appalachian Ohio	13.0	4.8	11.1	6.5	13.7	34.8
Pennsylvania	13.5	5.1	11.0	6.6	13.4	34.7
Appalachian Pennsylvania	14.8	5.5	11.9	6.9	14.5	35.8
Non-Appalachian Pennsylvania	12.4	4.8	10.3	6.4	12.5	33.6
South Carolina	14.4	4.3	12.5	6.4	16.0	37.3
Appalachian South Carolina	14.3	4.2	12.4	6.2	16.0	38.1
Non-Appalachian South Carolina	14.4	4.3	12.4	6.4	16.0	37.0
Tennessee	15.3	4.5	13.7	7.2	17.3	39.8
Appalachian Tennessee	17.8	5.0	15.7	8.2	20.0	40.7
Non-Appalachian Tennessee	13.4	4.2	11.9	6.6	15.1	38.8
Virginia	11.2	3.7	9.1	5.3	11.3	33.8
Appalachian Virginia	18.4	4.4	15.9	7.5	20.6	41.6
Non-Appalachian Virginia	10.4	3.7	8.4	7.5 5.1	10.4	32.7
West Virginia (entire state)	10.4	5.7 5.5	17.3	9.2	21.5	43.9

Note: The ACS defines persons with a disability as having difficulty in at least one of the following six areas: hearing, vision, cognition, walking or climbing, self-care, or attending to the functions of independent living. The disability universe consists of the civilian noninstitutional population. Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

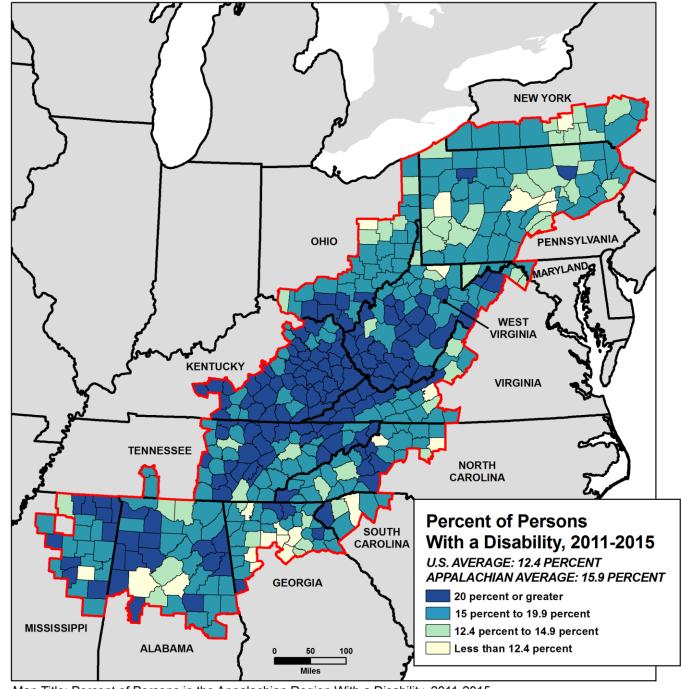


Figure 9.1: Percent of Persons in the Appalachian Region With a Disability, 2011-2015

Map Title: Percent of Persons in the Appalachian Region With a Disability, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In the 2011-2015 period, about one in six Appalachian residents reported having a disability, which the ACS defines as having difficulty in at least one of the following six areas: hearing, vision, cognition, walking or climbing, self-care, or attending to the functions of independent living. Disability prevalence is particularly high in some parts of the Region; the rate was 20 percent or more in 147 counties, two-fifths of which were in Appalachia's most rural counties (where the overall disability rate was 20 percent). Kentucky and West Virginia—the two states with the highest levels of disability in the Region—combined for nearly half of the 147 counties. Appalachia's relatively high disability rate corresponds to the population's older age structure: In 134 of the counties with the highest disability prevalence levels, at least 15 percent of the residents were age 65 or older.

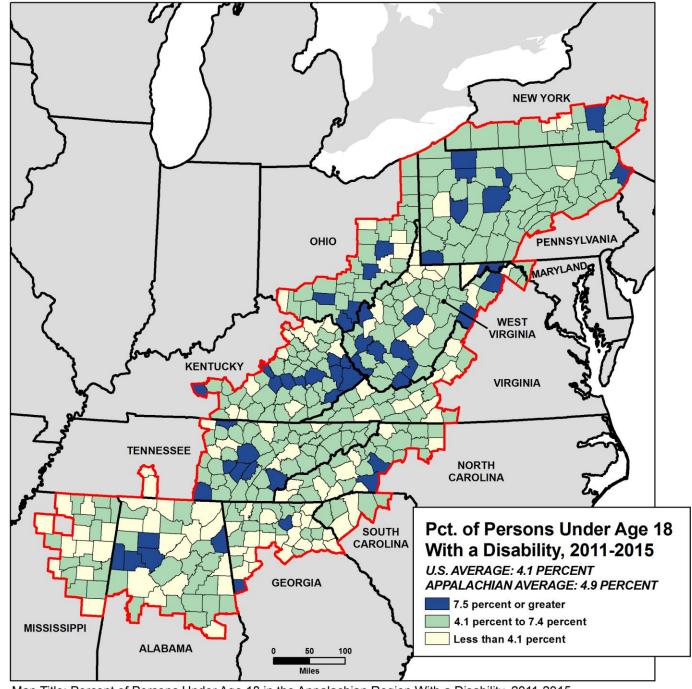


Figure 9.2: Percent of Persons Under Age 18 in the Appalachian Region With a Disability, 2011-2015

Map Title: Percent of Persons Under Age 18 in the Appalachian Region With a Disability, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

At almost 5 percent, the prevalence of disability among children under age 18 in Appalachia was slightly higher than the national average during the 2011-2015 period. But there was variation within the Region. For example, the rate was at least 7.5 percent in 51 counties, 39 of which were outside metropolitan areas. In 110 other counties, however, the disability prevalence was below the national average of just over 4 percent. Nearly two-thirds of the counties in the latter group were in South Central and Southern Appalachia. In fact, at just under 4 percent, Southern Appalachia was the only subregion where the disability rate among the under-18 population was below the national average.

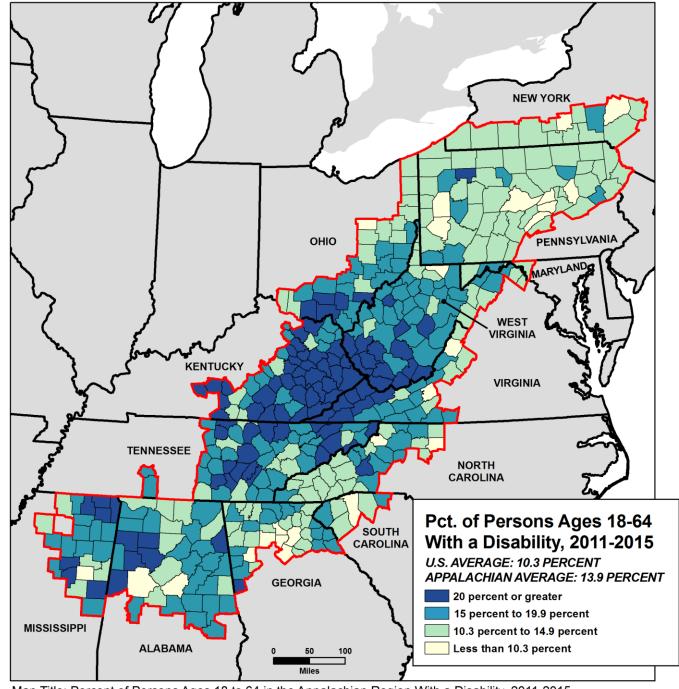


Figure 9.3: Percent of Persons Ages 18 to 64 in the Appalachian Region With a Disability, 2011-2015

Map Title: Percent of Persons Ages 18 to 64 in the Appalachian Region With a Disability, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In the 2011-2015 period, approximately one in seven adults ages 18 to 64 in Appalachia reported a disability, compared with about one in 10 in the nation as a whole. Disability prevalence was particularly high in some parts of the Region: In Central Appalachia, for example, more than one-fifth of working-age adults had a disability. Indeed, Central Appalachia had 56 of the 96 Appalachian counties where the disability rate among 18-to-64-year-olds was 20 percent or higher. Central Appalachia's historic reliance on mining and related resource-based industries, as well as Appalachia's relatively high rates of cancer, heart disease, and diabetes, may be associated with the subregion's high disability prevalence.

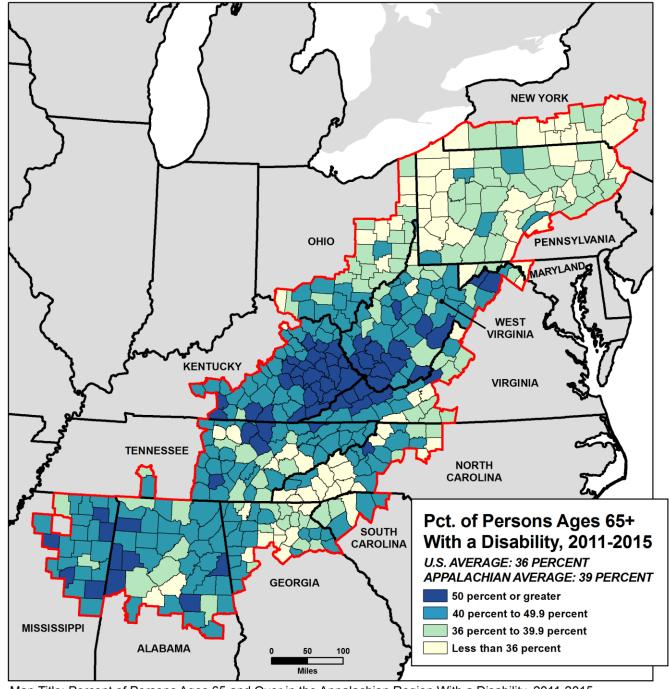


Figure 9.4: Percent of Persons Ages 65 and Over in the Appalachian Region With a Disability, 2011-2015

Map Title: Percent of Persons Ages 65 and Over in the Appalachian Region With a Disability, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Two-fifths of adults ages 65 and over in the Appalachian Region reported a disability in the 2011-2015 period, slightly higher than the national share. And the prevalence was even greater in some parts of the Region: Nearly half of the older residents of Central Appalachia—and half of older persons in Appalachian Kentucky—had at least one disability. Indeed, Central Appalachia had 41 of the 63 counties where at least half of older residents reported a disability. (Kentucky alone had 26 of these counties.) And there are signs that disabled adults in the Region may be aging in place: In 47 of these 63 counties, the share of working-age adults with a disability was at or above 20 percent—almost twice the national average. Yet there are 81 other Appalachian counties where the disability rate for the older population was actually lower than the national average. Nearly all of these low-prevalence counties were in Northern, South Central, and Southern Appalachia.

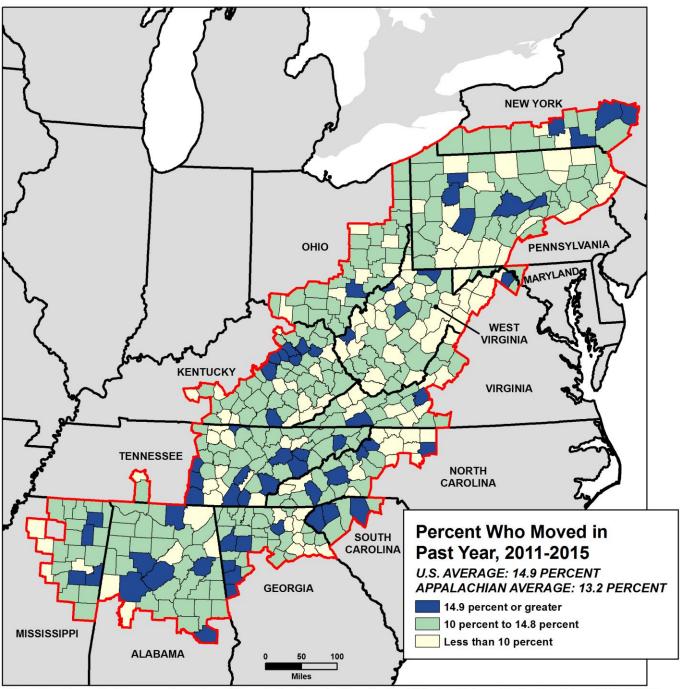
# **CHAPTER 10: MIGRATION**

Table 10.1: Mobility Status of Persons Ages 1 and Over in the Appalachian Region, 2011-2015

		Percent of Population Ages 1 and Over							
Mobility Status in the Last Year	Total Population	Did Not	Mo	Moved from a Different Residence in the Past Ye					
	Ages 1 and Over, 2011-2015	Move in Past		Within the		unty			
	2011-2013	Year		County		Within the State	Outside the State		
United States	312,784,059	85.1	14.9	8.8	6.1	3.2	2.9		
Appalachian Region	25,149,244	86.8	13.2	7.5	5.6	3.3	2.4		
Subregions	, ,								
Northern Appalachia	8,256,059	87.6	12.4	7.5	4.9	2.8	2.1		
North Central Appalachia	2,401,083	87.5	12.5	6.9	5.5	3.1	2.5		
Central Appalachia	1,880,759	87.8	12.2	6.8	5.4	3.6	1.9		
South Central Appalachia	4,728,562	86.1	13.9	7.7	6.3	3.6	2.7		
Southern Appalachia	7,882,781	86.0	14.0	7.9	6.1	3.6	2.5		
County Types	7,002,701	00.0	1 1.0	7.0	0.1	0.0	2.0		
Large Metros (pop. 1 million +)	5,895,846	87.1	12.9	7.4	5.5	3.2	2.3		
Small Metros (pop. <1 million)	10,622,239	86.0	14.0	8.0	6.0	3.2	2.8		
Nonmetro, Adjacent to Large Metros	2,179,486	87.0	13.0	7.8	5.2	3.5	1.7		
Nonmetro, Adjacent to Earge Metros  Nonmetro, Adjacent to Small Metros		88.2	11.8	6.7	5.2	3.3	1.7		
•	3,941,200								
Rural (nonmetro, not adj. to a metro)	2,510,473	87.5	12.5	6.9	5.6	3.7	1.9		
Alabama	4,774,581	85.3	14.7	8.9	5.8	3.2	2.6		
Appalachian Alabama	3,056,763	85.7	14.3	8.6	5.7	3.4	2.3		
Non-Appalachian Alabama	1,717,818	84.5	15.5	9.4	6.1	2.9	3.2		
Georgia	9,883,302	84.0	16.0	8.0	8.0	4.7	3.3		
Appalachian Georgia	3,010,538	86.8	13.2	6.7	6.5	4.0	2.5		
Non-Appalachian Georgia	6,872,764	82.7	17.3	8.6	8.7	5.0	3.7		
Kentucky	4,344,914	84.7	15.3	8.6	6.6	3.8	2.9		
Appalachian Kentucky	1,165,121	86.9	13.1	7.4	5.7	3.9	1.8		
Non-Appalachian Kentucky	3,179,793	83.9	16.1	9.1	7.0	3.7	3.3		
Maryland	5,861,210	86.6	13.4	7.2	6.1	2.7	3.4		
Appalachian Maryland	249,956	86.0	14.0	8.3	5.7	3.1	2.7		
Non-Appalachian Maryland	5,611,254	86.7	13.3	7.2	6.2	2.7	3.5		
Mississippi	2,953,205	86.1	13.9	7.5	6.4	3.7	2.7		
Appalachian Mississippi	621,775	86.0	14.0	8.1	5.9	3.8	2.1		
Non-Appalachian Mississippi	2,331,430	86.1	13.9	7.4	6.5	3.7	2.8		
New York	19,451,274	89.1	10.9	6.3	4.6	2.4	2.2		
Appalachian New York	1,045,638	85.4	14.6	8.5	6.1	3.7	2.5		
Non-Appalachian New York	18,405,636	89.3	10.7	6.2	4.5	2.4	2.1		
North Carolina	9,732,283	84.7	15.3	8.4	6.9	3.5	3.4		
Appalachian North Carolina	1,700,873	86.8	13.2	7.3	5.9	3.4	2.5		
Non-Appalachian North Carolina	8,031,410	84.3	15.7	8.6	7.1	3.6	3.5		
Ohio	11,446,837	85.3	14.7	9.4	5.4	3.3	2.1		
Appalachian Ohio	2,002,927	87.6	12.4	7.5	4.8	3.1	1.8		
Non-Appalachian Ohio	9,443,910	84.7	15.3	9.8	5.5	3.3	2.2		
Pennsylvania	12,643,406	88.0	12.0	7.2	4.8	2.6	2.3		
Appalachian Pennsylvania	5,716,041	87.9	12.1	7.3	4.8	2.7	2.0		
Non-Appalachian Pennsylvania	6,927,365	88.0	12.0	7.1	4.8	2.4	2.5		
South Carolina	4,723,298	84.7	15.3	8.4	7.0	3.1	3.9		
Appalachian South Carolina	1,193,705	85.0	15.0	8.8	6.2	3.0	3.2		
Non-Appalachian South Carolina	3,529,593	84.6	15.4	8.2	7.3	3.0	4.1		
Tennessee	6,422,999	84.7	15.4	9.0	6.3	3.1	3.2		
							2.7		
Appalachian Tennessee	2,796,608	86.1	13.9	7.9	6.0	3.3			
Non-Appalachian Tennessee	3,626,391	83.6	16.4	9.9	6.5	2.9	3.6		
Virginia	8,155,620	84.4	15.6	6.7	8.9	4.9	4.0		
Appalachian Virginia	756,057	86.0	14.0	6.6	7.4	4.6	2.8		
Non-Appalachian Virginia	7,399,563	84.2	15.8	6.7	9.1	5.0	4.1		
West Virginia (entire state)	1,833,242	88.2	11.8	6.4	5.3	2.6	2.		

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

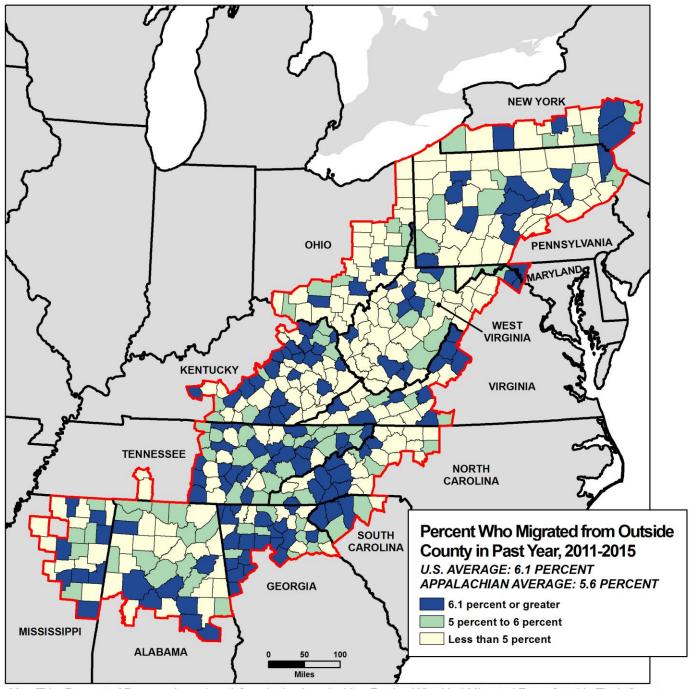
Figure 10.1: Percent of Persons Ages 1 and Over in the Appalachian Region Who Had Moved in the Past Year, 2011-2015



Map Title: Percent of Persons Ages 1 and Over in the Appalachian Region Who Had Moved in the Past Year, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Residential mobility in Appalachia was below the national average, as well as in all subregions and county types. In fact, the percentage of residents who moved in the past year only matched or exceeded the U.S. average in 61 of the Region's counties—37 of which were in South Central or Southern Appalachia. Most also were either counties in metropolitan areas, counties that housed a four-year college or university, or rural counties that were likely retirement or recreational destinations. Yet in 118 Appalachian counties, less than 10 percent of the residents had moved in the previous 12 months; almost three-fourths of these counties were outside metro areas.

Figure 10.2: Percent of Persons Ages 1 and Over in the Appalachian Region Who Had Migrated From Outside Their County of Residence in the Past Year, 2011-2015

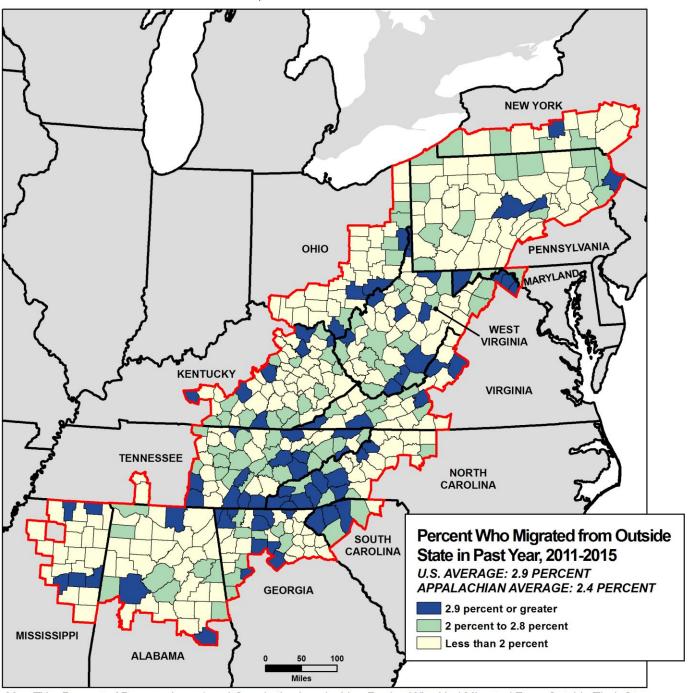


Map Title: Percent of Persons Ages 1 and Over in the Appalachian Region Who Had Migrated From Outside Their County of Residence in the Past Year, 2011-2015

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

While people in Appalachia were slightly less likely to have migrated from outside their county of residence in the 2011-2015 period than Americans as a whole, residents in 130 of the Region's counties had migration rates at or above the national average. These counties were scattered throughout Appalachia and were distributed across all urban/rural types. In 202 counties, however, less than 5 percent of the residents had migrated from another county. Almost three-fourths of these counties were outside metropolitan areas, and more than one-third of those nonmetro counties were rural counties not adjacent to a metro area.

Figure 10.3: Percent of Persons Ages 1 and Over in the Appalachian Region Who Had Migrated From Outside Their State of Residence in the Past Year, 2011-2015



Map Title: Percent of Persons Ages 1 and Over in the Appalachian Region Who Had Migrated From Outside Their State of Residence in the Past Year, 2011-2015

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

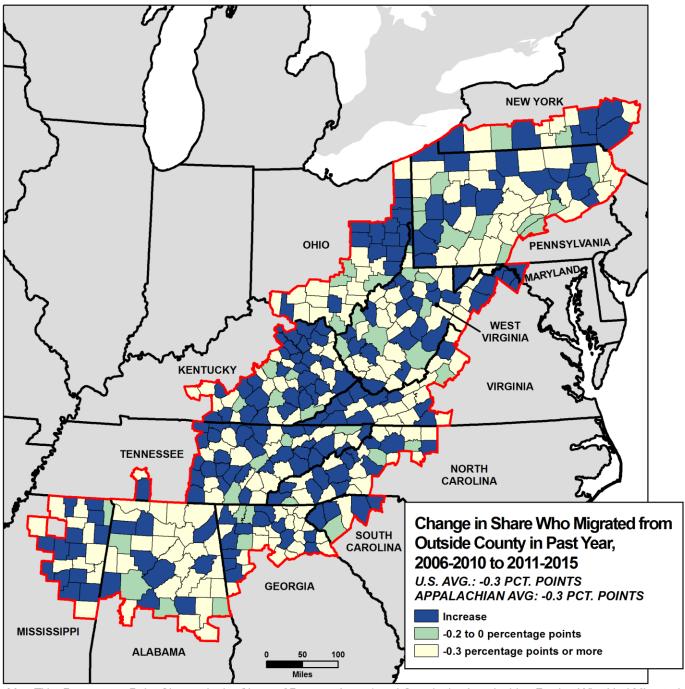
The share of people in the Appalachian Region who had migrated from outside their state of residence was 2.4 percent in the 2011-2015 period, compared with 2.9 percent of all Americans. Yet in 79 of Appalachia's 420 counties, out-of-state migration levels were at or above the U.S. average. Most of these counties were in Southern and South Central Appalachia, and almost half were in metropolitan areas. In contrast, there were 243 counties in the Region where less than 2 percent of residents had come from out of state. Almost three-fourths of the counties in this latter group were outside metropolitan areas.

Table 10.2: Percentage Point Change in Mobility Status of Persons Ages 1 and Over in the Appalachian Region, 2006-2010 to 2011-2015

		Percentage Poin		•	_		
Mobility Status in the Last Year	Did Not	Moved from a Different Residence in the Past Year  Outside the County					
ŕ	Move in Past Year		Within the County		Within the State	Outside the State	
United States	+ 0.9	- 0.9	- 0.6	- 0.3	- 0.1	- 0.1	
Appalachian Region	+ 0.8	- 0.8	- 0.6	- 0.3	+ 0.0	- 0.2	
Subregions							
Northern Appalachia	+ 0.3	- 0.3	- 0.1	- 0.2	- 0.1	- 0.1	
North Central Appalachia	+ 1.0	- 1.0	- 0.7	- 0.4	- 0.1	- 0.2	
Central Appalachia	+ 0.4	- 0.4	- 0.6	+ 0.2	+ 0.5	- 0.2	
South Central Appalachia	+ 0.8	- 0.8	- 0.7	- 0.1	+ 0.2	- 0.3	
Southern Appalachia	+ 1.6	- 1.6	- 1.0	- 0.6	- 0.2	- 0.3	
County Types							
Large Metros (pop. 1 million +)	+ 1.1	- 1.1	- 0.8	- 0.3	- 0.1	- 0.2	
Small Metros (pop. <1 million)	+ 0.8	- 0.8	- 0.6	- 0.2	- 0.1	- 0.2	
Nonmetro, Adjacent to Large Metros	+ 1.2	- 1.2	- 0.6	- 0.6	- 0.4	- 0.2	
Nonmetro, Adjacent to Small Metros	+ 0.9	- 0.9	- 0.5	- 0.3	+ 0.0	- 0.3	
Rural (nonmetro, not adj. to a metro)	+ 0.4	- 0.4	- 0.4	+ 0.0	+ 0.2	- 0.2	
Alabama	+ 1.0	- 1.0	- 0.5	- 0.6	- 0.1	- 0.4	
Appalachian Alabama	+ 1.3	- 1.3	- 0.8	- 0.4	- 0.1	- 0.4	
Non-Appalachian Alabama	+ 0.6	- 0.6	+ 0.1	- 0.7	- 0.1	- 0.5	
Georgia	+ 1.7	- 1.7	- 0.9	- 0.8	- 0.3	- 0.5	
Appalachian Georgia	+ 2.4	- 2.4	- 1.5	- 1.0	- 0.5	- 0.5	
Non-Appalachian Georgia	+ 1.2	- 1.2	- 0.6	- 0.7	- 0.2	- 0.4	
Kentucky	+ 0.7	- 0.7	- 0.5	- 0.3	+ 0.1	- 0.3	
Appalachian Kentucky	+ 0.4	- 0.4	- 0.5	+ 0.1	+ 0.5	- 0.4	
Non-Appalachian Kentucky	+ 0.8	- 0.8	- 0.4	- 0.4	- 0.1	- 0.3	
Maryland	+ 0.7	- 0.7	- 0.2	- 0.7	- 0.3	- 0.4	
Appalachian Maryland	- 0.1	+ 0.1	+ 0.6	- 0.6	+ 0.1	- 0.6	
Non-Appalachian Maryland	+ 0.8	- 0.8	- 0.1	- 0.6	- 0.3	- 0.3	
Mississippi	+ 1.8	- 1.8	- 1.3	- 0.5	- 0.2	- 0.2	
Appalachian Mississippi	+ 0.3	- 0.3	+ 0.0	- 0.3	- 0.2	- 0.1	
Non-Appalachian Mississippi	+ 2.1	- 2.1	- 1.6	- 0.5	- 0.2	- 0.3	
New York	+ 0.8	- 0.8	- 0.6	- 0.1	- 0.1	+ 0.0	
Appalachian New York	+ 0.5	- 0.5	- 0.1	- 0.4	- 0.3	+ 0.0	
Non-Appalachian New York	+ 0.8	- 0.8	- 0.7	- 0.1	- 0.1	- 0.1	
North Carolina	+ 1.3	- 1.3	- 0.7	- 0.6	- 0.1	- 0.5	
Appalachian North Carolina	+ 0.3	- 0.3	- 0.4	+ 0.1	+ 0.3	- 0.2	
Non-Appalachian North Carolina	+ 1.6	- 1.6	- 0.8	- 0.8	- 0.1	- 0.7	
Ohio	+ 0.3	- 0.3	- 0.4	+ 0.2	+ 0.0	+ 0.2	
Appalachian Ohio	+ 0.3	- 0.3	- 0.4	+ 0.1	+ 0.0	+ 0.1	
Non-Appalachian Ohio	+ 0.2	- 0.2	- 0.4	+ 0.2	+ 0.0	+ 0.2	
Pennsylvania	+ 0.6	- 0.6	- 0.3	- 0.3	- 0.1	- 0.1	
Appalachian Pennsylvania	+ 0.5	- 0.5	- 0.2	- 0.3	- 0.2	- 0.2	
Non-Appalachian Pennsylvania	+ 0.6	- 0.6	- 0.4	- 0.3	- 0.1	+ 0.0	
South Carolina	+ 0.4	- 0.4	+ 0.0	- 0.2	- 0.1	- 0.1	
Appalachian South Carolina	+ 1.5	- 1.5	- 1.2	- 0.3	- 0.1	- 0.2	
Non-Appalachian South Carolina	+ 0.0	+ 0.0	+ 0.3	- 0.2	+ 0.0	- 0.2	
Tennessee	+ 0.9	- 0.9	- 0.9	+ 0.0	+ 0.1	- 0.1	
Appalachian Tennessee	+ 0.9	- 0.9	- 0.9	- 0.1	+ 0.2	- 0.3	
Non-Appalachian Tennessee	+ 0.9	- 0.9	- 0.9	+ 0.0	+ 0.0	+ 0.1	
Virginia	+ 0.6	- 0.6	+ 0.0	- 0.6	- 0.3	- 0.3	
Appalachian Virginia	+ 1.1	- 1.1	- 0.8	- 0.4	- 0.3	+ 0.0	
Non-Appalachian Virginia	+ 0.5	- 0.5	+ 0.1	- 0.5	- 0.2	- 0.4	
West Virginia (entire state)	+ 0.6	- 0.6	- 0.5	- 0.2	+ 0.1	- 0.2	

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Figure 10.4: Percentage Point Change in the Share of Persons Ages 1 and Over in the Appalachian Region Who Had Migrated From Outside Their County of Residence in the Past Year, 2006-2010 to 2011-2015



Map Title: Percentage Point Change in the Share of Persons Ages 1 and Over in the Appalachian Region Who Had Migrated From Outside Their County of Residence in the Past Year, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

Both in Appalachia and the nation as a whole, the share of individuals migrating from outside their county of residence declined three-tenths of a percentage point between the 2006-2010 and 2011-2015 periods. The decrease was most prevalent in North Central and Southern Appalachia, and was greater than or equal to the national average in 190 counties in the Region. By contrast, the percentage remained the same in Appalachia's most rural counties and actually increased in Central Appalachia. Of the 184 counties where migration shares rose, 57 were in rural areas and 47 were in Central Appalachia.

#### TRENDS IN MIGRATION

- Like Americans as a whole, Appalachian residents were slightly less mobile in 2011-2015 than they
  were in 2006-2010. Between the two periods, the share of persons in the Region who had moved
  from a different residence in the past year decreased by almost a full percentage point to 13 percent
  in 2011-2015 (see Tables 10.1 and 10.2). Similarly, a slightly lower share of residents migrated from
  outside their county and their state of residence in 2011-2015 than in 2006-2010. (In both of the latter
  instances, the share dropped by less than half a percentage point.)
- Within the Region, the decline in residential mobility was greatest in Southern and North Central Appalachia, where the share of residents who had moved in the previous year fell by a full percentage point or more between 2006-2010 and 2011-2015. Still, all subregions and county types saw lower shares of their populations move in the later period than in the earlier one. One possible factor might lie in the rise of unemployment and the housing crisis during the Great Recession of 2007-2009. With relatively low educational attainment levels and relatively high homeownership in the Region, many Appalachian residents who lost their jobs might not have been able to sell their homes to move to another area with more employment opportunities.

# **CHAPTER 11: VETERAN STATUS**

Table 11.1: Veteran Status of Adult Civilians in the Appalachian Region, by Age Group, 2011-2015

		Civilian P	opulation		Per	cent Who	Are Vetera	ans
Veteran Status	Ages 18 and Over	Ages 18-34	Ages 35-64	Ages 65 and Over	Ages 18 and Over	Ages 18-34	Ages 35-64	Ages 65 and Over
United States	241,816,698	73,487,106	123,714,115	44,615,477	8.3	2.3	7.3	21.0
Appalachian Region	19,863,402	5,491,251	10,227,369	4,144,782	9.3	2.2	8.1	21.9
Subregions								
Northern Appalachia	6,649,402	1,801,905	3,368,143	1,479,354	9.9	2.2	8.2	23.2
North Central Appalachia	1,906,803	520,978	985,174	400,651	10.1	2.4	9.1	22.5
Central Appalachia	1,486,208	388,669	785,530	312,009	8.0	1.9	6.9	18.4
South Central Appalachia	3,781,482	1,017,966	1,913,860	849,656	9.5	2.2	8.1	21.7
Southern Appalachia	6,039,507	1,761,733	3,174,662	1,103,112	8.7	2.2	7.9	21.2
County Types								
Large Metros (pop. 1 million +)	4,578,743	1,282,386	2,441,199	855,158	8.8	2.0	7.6	22.3
Small Metros (pop. <1 million)	8,435,173	2,411,502	4,275,186	1,748,485	9.6	2.2	8.6	22.4
Nonmetro, Adjacent to Large Metros	1,719,716	464,284	883,745	371,687	9.7	2.1	8.5	21.9
Nonmetro, Adjacent to Small Metros	3,140,423	792,881	1,614,961	732,581	9.9	2.5	8.1	21.8
Rural (nonmetro, not adj. to a metro)	1,989,347	540,198	1,012,278	436,871	8.3	2.1	6.8	19.5
Alabama	3,705,690	1,093,260	1,893,104	719,326	9.8	2.7	9.4	21.6
Appalachian Alabama	2,384,910	693,197	1,230,548	461,165	9.3	2.4	8.7	21.3
Non-Appalachian Alabama	1,320,780	400,063	662,556	258,161	10.6	3.3	10.6	22.2
Georgia	7,466,582	2,345,109	3,931,006	1,190,467	9.0	2.6	9.0	21.4
Appalachian Georgia	2,248,617	650,859	1,232,356	365,402	8.1	1.8	7.4	21.6
Non-Appalachian Georgia	5,217,965	1,694,250	2,698,650	825,065	9.4	2.9	9.8	21.3
Kentucky	3,366,540	980,766	1,752,799	632,975	8.8	2.5	8.2	20.4
Appalachian Kentucky	915,257	248,942	481,357	184,958	7.7	1.9	6.8	18.0
Non-Appalachian Kentucky	2,451,283	731,824	1,271,442	448,017	9.3	2.7	8.8	21.4
Maryland	4,555,597	1,359,262	2,405,184	791,151	8.9	2.8	8.3	20.9
Appalachian Maryland	199,976	55,650	101,920	42,406	10.3	2.5	9.6	22.5
Non-Appalachian Maryland	4,355,621	1,303,612	2,303,264	748,745	8.8	2.8	8.3	20.8
Mississippi	2,241,286	691,917	1,134,536	414,833	8.2	2.5	7.7	19.3
Appalachian Mississippi	477,303	144,443	237,847	95,013	7.4	2.2	6.4	17.7
Non-Appalachian Mississippi	1,763,983	547,474	896,689	319,820	8.5	2.5	8.1	19.8
New York	15,397,847	4,771,186	7,806,226	2,820,435	5.4	1.2	4.1	15.8
Appalachian New York	842,269	256,040	409,078	177,151	9.4	2.2	8.3	22.2
Non-Appalachian New York	14,555,578	4,515,146	7,397,148	2,643,284	5.2	1.2	3.9	15.4
North Carolina	7,478,600	2,190,308	3,887,100	1,401,192	9.3	2.9	8.7	20.9
Appalachian North Carolina	1,360,439	352,658	692,276	315,505	9.4	2.1	7.7	21.4
Non-Appalachian North Carolina	6,118,161	1,837,650	3,194,824	1,085,687	9.3	3.1	8.9	20.8
Ohio	8,911,658	2,550,533	4,613,844	1,747,281	9.1	2.1	8.0	21.8
Appalachian Ohio	1,573,005	411,485	821,815	339,705	10.0	2.1	8.8	22.8
Non-Appalachian Ohio	7,338,653	2,139,048	3,792,029	1,407,576	8.8	2.1	7.9	21.6
Pennsylvania	10,052,453	2,849,717	5,118,350	2,084,386	8.7	1.9	7.0	22.0
Appalachian Pennsylvania	4,623,693	1,246,457	2,343,796	1,033,440	9.9	2.2	8.0	23.4
Non-Appalachian Pennsylvania	5,428,760	1,603,260	2,774,554	1,050,946	7.6	1.6	6.2	20.7
South Carolina	3,665,349	1,074,995	1,863,575	726,779	10.3	3.2	9.8	22.4
Appalachian South Carolina	928,677	273,234	473,911	181,532	9.0	2.2	7.8	22.0
Non-Appalachian South Carolina	2,736,672	801,761	1,389,664	545,247	10.8	3.5	10.4	22.5
Tennessee	4,989,249	1,464,739	2,574,185	950,325	9.3	2.6	8.6	21.3
Appalachian Tennessee	2,223,282	595,731	1,137,844	489,707	9.8	2.3	8.5	21.8
Non-Appalachian Tennessee	2,765,967	869,008	1,436,341	460,618	8.9	2.8	8.8	20.8
Virginia	6,281,984	1,904,418	3,275,905	1,101,661	11.2	4.4	11.3	22.8
Appalachian Virginia	617,739	173,638	304,609	139,492	8.3	1.7	6.9	19.7
Non-Appalachian Virginia	5,664,245	1,730,780	2,971,296	962,169	11.6	4.6	11.8	23.3
West Virginia (entire state)	1,468,235	388,917	760,012	319,306	10.2	2.5	9.0	22.4

Note: The ACS defines veterans as men and women who have served on active duty in the U.S. Armed Forces, the National Guard or Reserves, or in the U.S. Merchant Marine during World War II.

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Table 11.2: Veteran Status of Adult Civilians in the Appalachian Region, by Gender, 2011-2015

United States         Appalachian Region         241,816,698         117,201,081           Appalachian Regions         19,863,402         9,637,692           Subregions         19,863,402         3,249,512           North Central Appalachia         1,906,803         3936,243           Central Appalachia         1,486,208         728,943           South Central Appalachia         3,781,482         1,822,529           Southern Appalachia         6,039,507         2,900,465           County Types         Large Metros (pop. 1 million)         8,435,173         4,081,809           Small Metros (pop. 1 million)         8,435,173         4,081,809           Nonmetro, Adjacent to Small Metros         1,719,716         846,888           Nomidero, Adjacent to Small Metros         1,719,716         846,888           Rural (nonmetro, not adj. to a metro)         1,989,347         973,880           Alabama         3,705,690         1,762,757           Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         7,248,617         1,088,565           Non-Appalachian Kentucky         3,366,540         1,629,634           Appalachian Maryland         199,976 <th>8 and Over</th> <th>Percei</th> <th colspan="4">Percent Who Are Veterans</th>	8 and Over	Percei	Percent Who Are Veterans			
Appalachian Region         19,863,402         9,637,692           Subregions         8           North Central Appalachia         1,906,803         936,243           Central Appalachia         1,486,208         728,943           South Central Appalachia         3,781,482         1,822,529           Southern Appalachia         6,039,507         2,900,465           County Types         Large Metros (pop. 1 million)         8,435,173         4,081,809           Nonmetro, Adjacent to Large Metros Nonmetro, Adjacent to Small Metros Rural (normetro, not adj. to a metro)         1,719,716         846,888           Non-Appalachian Alabama         3,705,690         1,762,757           Appalachian Alabama         2,384,910         1,139,070           Non-Appalachian Alabama         1,320,780         623,687           Georgia         7,466,552         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Maryland         4,555,597         2,164,162           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         4,736,983         389,643	Females	Both Sexes	Males	Females		
Northern Appalachia   6,649,402   3,249,512   North Central Appalachia   1,906,803   936,243   Central Appalachia   1,906,803   728,943   South Central Appalachia   3,781,482   1,822,529   Southern Appalachia   6,039,507   2,900,465	124,615,617	8.3	15.8	1.3		
Northern Appalachia         6,649,402         3,249,512           North Central Appalachia         1,906,803         936,243           Central Appalachia         1,486,208         728,943           South Central Appalachia         6,039,507         2,900,465           County Types           Large Metros (pop. 1 million)         4,578,743         2,197,276           Small Metros (pop. <1 million)         8,435,173         4,081,809           Nonmetro, Adjacent to Small Metros         3,140,423         1,537,839           Rural (nonmetro, not adj. to a metro)         1,989,347         973,880           Alabama         3,705,690         1,762,757           Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Maryland         4,555,597         2,164,162           Appalachian Maryland         4,355,621         2,062,324           Mississispipi         4,77,303         227,346<	10,225,710	9.3	18.1	1.1		
North Central Appalachia						
Central Appalachia         1,486,208         728,943           South Central Appalachia         3,781,482         1,822,529           Southern Appalachia         6,039,507         2,900,465           County Types         2,900,465           Large Metros (pop. 1 million +)         4,578,743         2,197,276           Small Metros (pop. <1 million)	3,399,890	9.9	19.1	1.1		
South Central Appalachia         3,781,482         1,822,529           Southern Appalachia         6,039,507         2,900,465           County Types         4,578,743         2,197,276           Large Metros (pop. 1 million)         8,435,173         4,081,809           Nonmetro, Adjacent to Large Metros         1,719,716         846,888           Nonmetro, Adjacent to Small Metros         3,140,423         1,537,839           Rural (nonmetro, not adj. to a metro)         1,989,347         973,880           Alabama         3,705,690         1,762,757           Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         915,257         447,512           Non-Appalachian Maryland         1,99,976         101,838           Non-Appalachian Maryland         199,976         101,838           Non-Appalachian Mississippi         2,241,286         1,066,983           Appalachian New York         15,39,847         7,346,398           New York	970,560	10.1	19.4	1.1		
Southern Appalachia         6,039,507         2,900,465           County Types         2         2,197,276           Large Metros (pop. 1 million)         8,435,173         4,081,809           Nonmetro, Adjacent to Large Metros         1,719,716         846,888           Nonmetro, Adjacent to Small Metros         3,140,423         1,537,839           Rural (nonmetro, not adj. to a metro)         1,989,347         973,880           Alabama         3,705,690         1,762,757           Appalachian Alabama         2,384,910         1,139,070           Non-Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Mentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Mississippi         2,241,286         1,066,983           New York         15,397,847<	757,265	8.0	15.5	0.7		
County Types         Large Metros (pop. 1 million +)         4,578,743         2,197,276           Small Metros (pop1 million)         8,435,173         4,081,809           Nonmetro, Adjacent to Large Metros         1,719,716         846,888           Nonmetro, Adjacent to Small Metros         3,140,423         1,537,839           Rural (nonmetro, not adj. to a metro)         1,989,347         973,880           Alabama         3,705,690         1,762,757           Appalachian Alabama         2,384,910         1,139,070           Non-Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Mentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Mississippi         477,303         227,340           Non-Appalachian New York         15,397,847         7,346,398 <td>1,958,953</td> <td>9.5</td> <td>18.6</td> <td>1.2</td>	1,958,953	9.5	18.6	1.2		
Large Metros (pop. 1 million +)         4,578,743         2,197,276           Small Metros (pop. <1 million)	3,139,042	8.7	16.8	1.2		
Small Metros (pop. <1 million)						
Nonmetro, Adjacent to Large Metros Nonmetro, Adjacent to Small Metros Rural (nonmetro, not adj. to a metro)         1,719,716         846,888           Alabama         3,140,423         1,537,839           Appalachian Alabama         3,705,690         1,762,757           Appalachian Alabama         2,384,910         1,139,070           Non-Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         915,257         447,512           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Mississispipi         2,241,286         1,066,983           Appalachian Mississispipi         477,303         227,340           Non-Appalachian New York         15,397,847         7,346,398           Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073	2,381,467	8.8	17.1	1.1		
Nonmetro, Adjacent to Small Metros Rural (nonmetro, not adj. to a metro)	4,353,364	9.6	18.6	1.2		
Rural (nonmetro, not adj. to a metro)         1,989,347         973,880           Alabama         3,705,690         1,762,757           Appalachian Alabama         2,384,910         1,139,070           Non-Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Mississippi         2,241,286         1,066,983           Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         842,269         412,545           Non-Appalachian North Carolina         1,360,439         652,407           Non-Appalachian Ohio         7,538,653	872,828	9.7	18.5	1.1		
Alabama         3,705,690         1,762,757           Appalachian Alabama         2,384,910         1,139,070           Non-Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         199,976         101,838           Non-Appalachian Mississisppi         477,303         227,340           Non-Appalachian Mississisppi         477,303         227,340           Non-Appalachian New York         15,397,847         7,346,398           Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian Ohio         1,573,005	1,602,584	9.9	19.1	1.0		
Alabama         3,705,690         1,762,757           Appalachian Alabama         2,384,910         1,139,070           Non-Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         199,976         101,838           Non-Appalachian Mississisppi         477,303         227,340           Non-Appalachian Mississisppi         477,303         227,340           Non-Appalachian New York         15,397,847         7,346,398           Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian Ohio         1,573,005	1,015,467	8.3	16.0	0.9		
Non-Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         1,573,005         770,085	1,942,933	9.8	18.9	1.5		
Non-Appalachian Alabama         1,320,780         623,687           Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         1,573,005         770,085	1,245,840	9.3	18.1	1.3		
Georgia         7,466,582         3,570,384           Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississispipi         477,303         227,340           Non-Appalachian Mississispipi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889<	697,093	10.6	20.4	1.9		
Appalachian Georgia         2,248,617         1,088,565           Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         7,338,653         3,526,889	3,896,198	9.0	16.8	1.9		
Non-Appalachian Georgia         5,217,965         2,481,819           Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississisppi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440	1,160,052	8.1	15.5	1.2		
Kentucky         3,366,540         1,629,634           Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         842,269         412,545           Non-Appalachian North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760 <td>2,736,146</td> <td>9.4</td> <td>17.3</td> <td>2.1</td>	2,736,146	9.4	17.3	2.1		
Appalachian Kentucky         915,257         447,512           Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         928,677	1,736,906	8.8	17.0	1.2		
Non-Appalachian Kentucky         2,451,283         1,182,122           Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         928,677         445,4	467,745	7.7	14.9	0.8		
Maryland         4,555,597         2,164,162           Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1	1,269,161	9.3	17.8	1.3		
Appalachian Maryland         199,976         101,838           Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249 </td <td>2,391,435</td> <td>8.9</td> <td>16.5</td> <td>1.9</td>	2,391,435	8.9	16.5	1.9		
Non-Appalachian Maryland         4,355,621         2,062,324           Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249	98,138	10.3	18.7	1.7		
Mississippi         2,241,286         1,066,983           Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,765,967	2,293,297	8.8	16.4	2.0		
Appalachian Mississippi         477,303         227,340           Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,9	1,174,303	8.2	15.9	1.3		
Non-Appalachian Mississippi         1,763,983         839,643           New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984	249,963	7.4	14.4	1.0		
New York         15,397,847         7,346,398           Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	924,340	8.5	16.3	1.4		
Appalachian New York         842,269         412,545           Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	8,051,449	5.4	10.6	0.6		
Non-Appalachian New York         14,555,578         6,933,853           North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	429,724	9.4	17.9	1.2		
North Carolina         7,478,600         3,555,073           Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	7,621,725	5.2	10.2	0.6		
Appalachian North Carolina         1,360,439         652,407           Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	3,923,527	9.3	17.8	1.6		
Non-Appalachian North Carolina         6,118,161         2,902,666           Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	708,032	9.4	18.4	1.1		
Ohio         8,911,658         4,296,974           Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	3,215,495	9.3	17.6	1.8		
Appalachian Ohio         1,573,005         770,085           Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	4,614,684	9.1	17.6	1.1		
Non-Appalachian Ohio         7,338,653         3,526,889           Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	802,920	10.0	19.6	0.9		
Pennsylvania         10,052,453         4,847,440           Appalachian Pennsylvania         4,623,693         2,257,528           Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	3,811,764	8.8	17.1	1.2		
Appalachian Pennsylvania       4,623,693       2,257,528         Non-Appalachian Pennsylvania       5,428,760       2,589,912         South Carolina       3,665,349       1,746,945         Appalachian South Carolina       928,677       445,490         Non-Appalachian South Carolina       2,736,672       1,301,455         Tennessee       4,989,249       2,390,481         Appalachian Tennessee       2,223,282       1,072,364         Non-Appalachian Tennessee       2,765,967       1,318,117         Virginia       6,281,984       3,016,056	5,205,013	8.7	16.9	1.0		
Non-Appalachian Pennsylvania         5,428,760         2,589,912           South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	2,366,165	9.9	19.1	1.1		
South Carolina         3,665,349         1,746,945           Appalachian South Carolina         928,677         445,490           Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	2,838,848	7.6	15.0	1.0		
Appalachian South Carolina       928,677       445,490         Non-Appalachian South Carolina       2,736,672       1,301,455         Tennessee       4,989,249       2,390,481         Appalachian Tennessee       2,223,282       1,072,364         Non-Appalachian Tennessee       2,765,967       1,318,117         Virginia       6,281,984       3,016,056	1,918,404	10.3	19.8	1.8		
Non-Appalachian South Carolina         2,736,672         1,301,455           Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	483,187	9.0	17.6	1.0		
Tennessee         4,989,249         2,390,481           Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	1,435,217	10.8	20.5	2.0		
Appalachian Tennessee         2,223,282         1,072,364           Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	2,598,768	9.3	17.8	1.4		
Non-Appalachian Tennessee         2,765,967         1,318,117           Virginia         6,281,984         3,016,056	1,150,918	9.8	19.0	1.2		
Virginia 6,281,984 3,016,056	1,447,850	8.9	16.9	1.6		
	3,265,928	11.2	20.5	2.7		
Appaiaonan viigina   017,700   300,024	312,215	8.3	16.0	0.9		
Non-Appalachian Virginia 5,664,245 2,710,532	2,953,713	11.6	21.0	2.9		
West Virginia (entire state) 1,468,235 717,424	750,811	10.2	19.8	1.1		

Note: The ACS defines veterans as men and women who have served on active duty in the U.S. Armed Forces, the National Guard or Reserves, or in the U.S. Merchant Marine during World War II.

Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

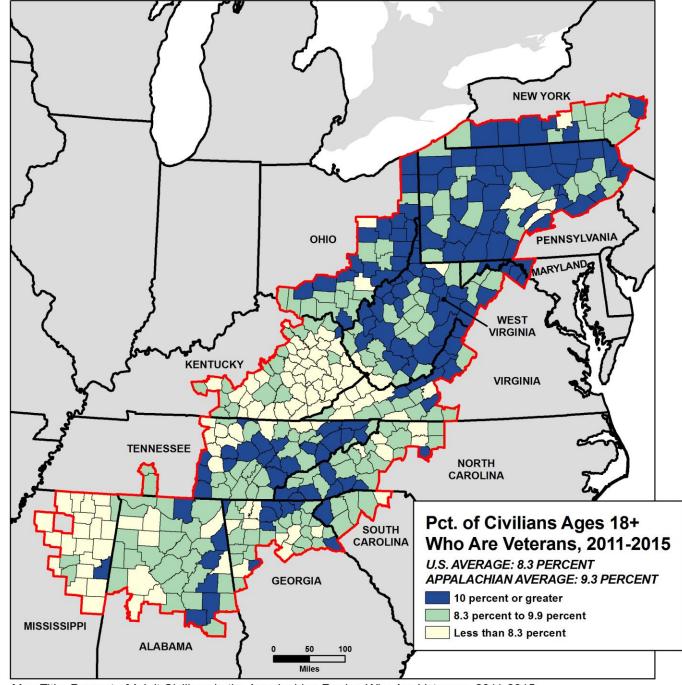


Figure 11.1: Percent of Adult Civilians in the Appalachian Region Who Are Veterans, 2011-2015

Map Title: Percent of Adult Civilians in the Appalachian Region Who Are Veterans, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In 2011-2015, a little more than 9 percent of adult civilians in the Appalachian Region were veterans—men and women who have served on active duty in the U.S. Armed Forces, the National Guard or Reserves, or in the U.S. Merchant Marine during World War II. While slightly higher than the national average, there was considerable variation throughout the Region. In 145 Appalachian counties, for example, at least one in 10 civilian residents were veterans. Most of the counties with the highest share of veterans were in Northern and North Central Appalachia, although there were pockets of high concentration further south. In contrast, the veteran prevalence rate was lower than the national average in 107 counties; nearly half the counties in this group were in Central Appalachia—and 37 of them were in Kentucky alone. Another 20 of these counties were in Appalachian Mississippi—the Region's only other state besides Kentucky where veterans were less than 8 percent of adult civilians.

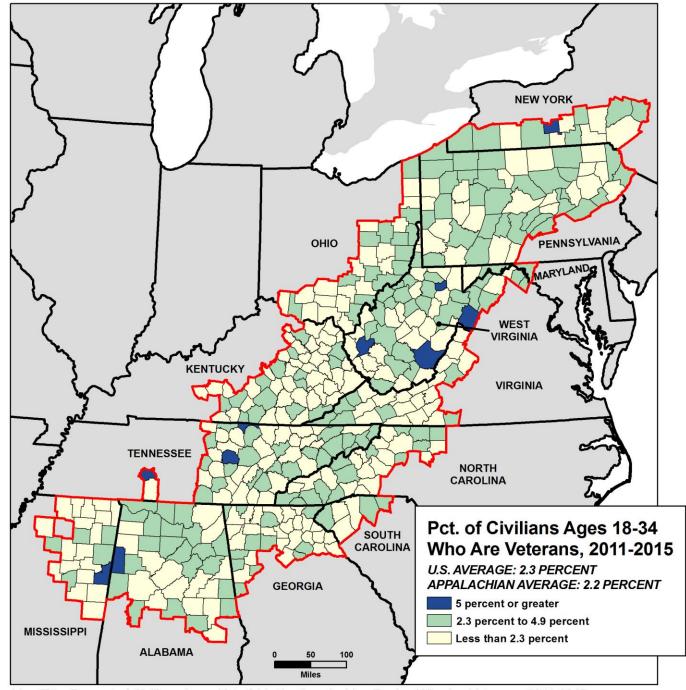


Figure 11.2: Percent of Civilians Ages 18 to 34 in the Appalachian Region Who Are Veterans, 2011-2015

Map Title: Percent of Civilians Ages 18 to 34 in the Appalachian Region Who Are Veterans, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

Military veterans accounted for just 2.2 percent of Appalachia's young adult (ages 18-34) civilian population in the 2011-2015 period, compared to 2.3 percent for the nation as a whole. Yet in 184 of the Region's 420 counties, the prevalence was at or above the national rate. In fact, there were 10 Appalachian counties where at least 5 percent of 18-to-34-year-old civilians were veterans. Most veterans of the wars in Iraq and Afghanistan fall in this age group.

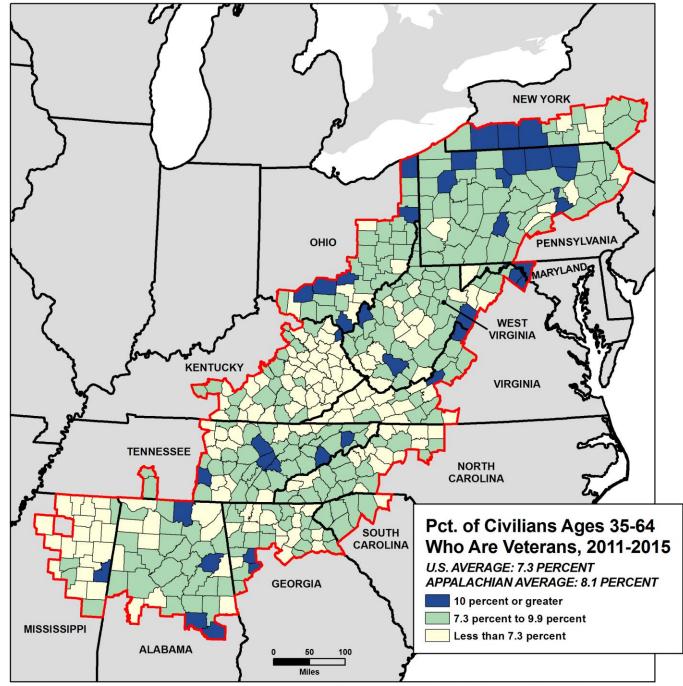


Figure 11.3: Percent of Civilians Ages 35 to 64 in the Appalachian Region Who Are Veterans, 2011-2015

Map Title: Percent of Civilians Ages 35 to 64 in the Appalachian Region Who Are Veterans, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In the Appalachian Region, 8 percent of civilians ages 35 to 64 were military veterans in 2011-2015, slightly above the U.S. rate of just over 7 percent. The prevalence was even higher in some counties: In 40 of them, veterans comprised at least one-tenth of 35-to-64-year-old civilian residents. More than half of these counties were in Northern and North Central Appalachia, although there were also pockets of concentration in the South Central and Southern subregions. Yet the veteran prevalence rate was lower than the national average in 154 counties; all but a handful of these were in Central, South Central, and Southern Appalachia. Most veterans of the 1991 Gulf War fall in this age group, as do the youngest Vietnam veterans.

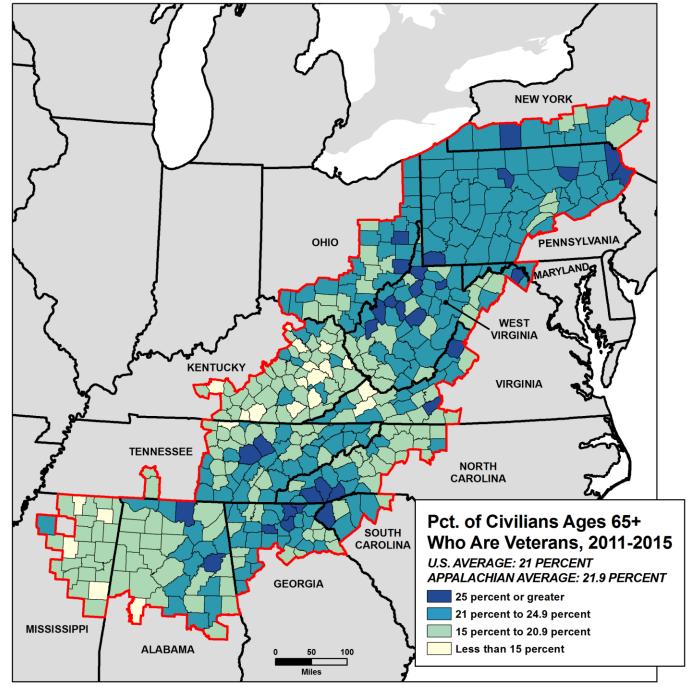


Figure 11.4: Percent of Civilians Ages 65 and Over in the Appalachian Region Who Are Veterans, 2011-2015

Map Title: Percent of Civilians Ages 65 and Over in the Appalachian Region Who Are Veterans, 2011-2015 Data Source: U.S. Census Bureau, 2011-2015 American Community Survey.

In 2011-2015, more than one-fifth of Appalachia's older civilian residents were military veterans—most of whom served during World War II and the wars in Korea and Vietnam. Yet there is some variation within the Region. For example, at least 25 percent of older civilians were veterans in 31 counties. Most counties in this group were in Northern and North Central Appalachia. By contrast, there were 21 counties where veterans comprised less than 15 percent of the older civilian residents. Kentucky had 13 of the counties in this latter group; veterans were just 18 percent of older civilians in the state's Appalachian section. (Among the states, only Appalachian Mississippi had a lower share.)

Table 11.3: Percentage Point Change in Veteran Status of Adult Civilians in the Appalachian Region, by Age Group and Gender, 2006-2010 to 2011-2015

	Percentage Point Change in Share of Adults Who Are Veterans								
Veteran Status	Total, Ages	E		By Ge	ender				
	18 and Over	Ages 18-34	Ages 35-64	Ages 65 and Over	Males	Females			
United States	- 1.6	- 0.3	- 2.4	- 2.6	- 3.3	+ 0.0			
Appalachian Region	- 1.7	- 0.3	- 2.6	- 2.1	- 3.3	- 0.1			
Subregions									
Northern Appalachia	- 1.8	- 0.4	- 2.6	- 2.4	- 3.9	- 0.1			
North Central Appalachia	- 1.6	- 0.6	- 2.4	- 2.1	- 3.2	- 0.1			
Central Appalachia	- 1.4	- 0.6	- 2.2	- 1.7	- 2.8	- 0.2			
South Central Appalachia	- 1.6	- 0.1	- 2.8	- 1.7	- 3.2	+ 0.0			
Southern Appalachia	- 1.5	- 0.3	- 2.6	- 1.8	- 3.0	- 0.1			
County Types									
Large Metros (pop. 1 million +)	- 1.6	- 0.5	- 2.5	- 2.3	- 3.4	- 0.2			
Small Metros (pop. <1 million)	- 1.6	- 0.4	- 2.5	- 2.1	- 3.4	+ 0.0			
Nonmetro, Adjacent to Large Metros	- 1.6	- 0.3	- 2.7	- 2.0	- 3.4	+ 0.0			
Nonmetro, Adjacent to Small Metros	- 1.5	+ 0.0	- 2.7	- 1.9	- 3.2	- 0.1			
Rural (nonmetro, not adj. to a metro)	- 1.6	- 0.4	- 2.7	- 1.9	- 3.4	+ 0.0			
Alabama	- 1.6	- 0.4	- 2.6	- 2.2	- 3.5	- 0.1			
Appalachian Alabama	- 1.8	- 0.2	- 2.9	- 2.2	- 3.5	- 0.1			
Non-Appalachian Alabama	- 1.5	- 0.7	- 2.1	- 2.0	- 3.3	+ 0.0			
Georgia	- 1.2	- 0.3	- 2.2	- 1.5	- 2.5	+ 0.1			
Appalachian Georgia	- 1.3	- 0.6	- 2.4	- 1.3	- 2.4	- 0.1			
Non-Appalachian Georgia	- 1.2	- 0.2	- 2.1	- 1.7	- 2.6	+ 0.0			
Kentucky	- 1.4	- 0.3	- 2.3	- 1.6	- 2.8	- 0.1			
Appalachian Kentucky	- 1.3	- 0.5	- 2.0	- 1.5	- 2.6	- 0.1			
Non-Appalachian Kentucky	- 1.4	- 0.3	- 2.3	- 1.6	- 2.9	- 0.1			
Maryland	- 1.7	- 0.6	- 2.3	- 3.0	- 3.6	- 0.1			
Appalachian Maryland	- 1.6	- 0.7	- 1.7	- 3.0	- 3.6	+ 0.5			
Non-Appalachian Maryland	- 1.7	- 0.6	- 2.3	- 3.0	- 3.6	- 0.1			
Mississippi	- 1.6	- 0.3	- 2.4	- 2.3	- 3.1	- 0.1			
Appalachian Mississippi	- 1.4	- 0.2	- 2.4	- 2.0	- 3.4	+ 0.2			
Non-Appalachian Mississippi	- 1.5	- 0.5	- 2.3	- 2.3	- 3.1	- 0.2			
New York	- 1.5	- 0.2	- 2.1	- 3.1	- 3.2	- 0.1			
Appalachian New York	- 1.8	- 0.1	- 2.9	- 2.7	- 3.8	+ 0.0			
Non-Appalachian New York	- 1.5	- 0.2	- 2.0	- 3.1	- 3.1	- 0.1			
North Carolina	- 1.5	- 0.2	- 2.5	- 1.9	- 3.0	- 0.1			
Appalachian North Carolina	- 1.5	+ 0.1	- 2.7	- 2.0	- 3.2	- 0.1			
Non-Appalachian North Carolina	- 1.4	- 0.3	- 2.5	- 1.9	- 3.0	+ 0.0			
Ohio	- 1.6	- 0.3	- 2.6	- 2.4	- 3.4	- 0.1			
Appalachian Ohio	- 1.6	- 0.4	- 2.5	- 1.8	- 3.1	- 0.2			
Non-Appalachian Ohio	- 1.7	- 0.3	- 2.6	- 2.5	- 3.6	+ 0.0			
Pennsylvania	- 1.9	- 0.4	- 2.6	- 2.8	- 4.0	- 0.1			
Appalachian Pennsylvania	- 1.9	- 0.4	- 2.6	- 2.6	- 4.0	- 0.1			
Non-Appalachian Pennsylvania	- 1.9	- 0.4	- 2.6	- 2.9	- 3.9	+ 0.0			
South Carolina	- 1.5	- 0.2	- 2.4	- 2.3	- 3.1	+ 0.1			
Appalachian South Carolina	- 1.4	- 0.3	- 2.6	- 1.9	- 2.8	- 0.2			
Non-Appalachian South Carolina	- 1.5	- 0.2	- 2.4	- 2.5	- 3.2	+ 0.1			
Tennessee	- 1.4	- 0.1	- 2.6	- 1.7	- 3.0	+ 0.0			
Appalachian Tennessee	- 1.3	- 0.1	- 2.6	- 1.4	- 2.9	+ 0.0			
Non-Appalachian Tennessee	- 1.4	- 0.1	- 2.4	- 1.9	- 3.1	+ 0.1			
Virginia	- 1.6	- 0.5	- 2.2	- 2.3	- 3.2	+ 0.0			
Appalachian Virginia	- 2.1	- 0.9	- 2.9	- 2.8	- 4.1	- 0.1			
Non-Appalachian Virginia	- 1.4	- 0.6	- 2.1	- 2.2	- 3.2	+ 0.0			
West Virginia (entire state)	- 1.6	- 0.6	- 2.4	- 2.0	- 3.2	- 0.1			

Note: The ACS defines veterans as men and women who have served on active duty in the U.S. Armed Forces, the National Guard or Reserves, or in the U.S. Merchant Marine during World War II.

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

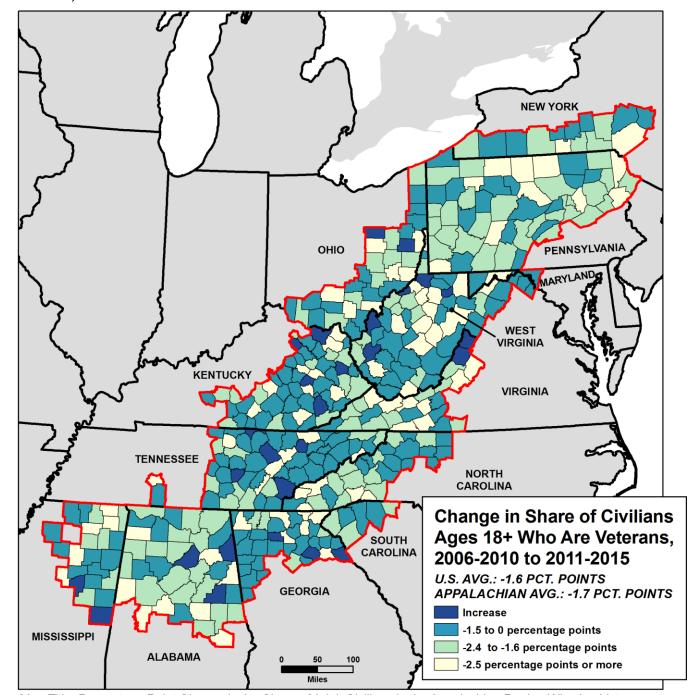


Figure 11.5: Percentage Point Change in the Share of Adult Civilians in the Appalachian Region Who Are Veterans, 2006-2010 to 2011-2015

Map Title: Percentage Point Change in the Share of Adult Civilians in the Appalachian Region Who Are Veterans, 2006-2010 to 2011-2015

Data Sources: U.S. Census Bureau, 2006-2010 and 2011-2015 American Community Surveys.

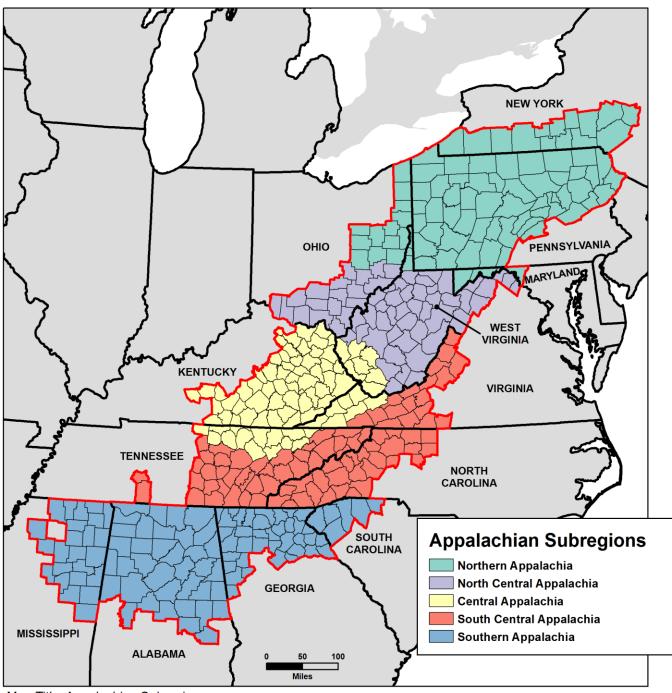
The share of Appalachia's adult civilians who were military veterans was almost two percentage points lower in the 2011-2015 period than it was in 2006-2010. And although the magnitude of the decrease varied little among the subregions, county types, and the Appalachian versus non-Appalachian portions of the 13 states, there was some variation at the county level. In 84 Appalachian counties, for example (spread throughout the Region), veterans' share of the population fell by at least 2.5 percentage points. Yet the share actually rose in 27 counties—21 of which were in Central, South Central, and Southern Appalachia. Veterans were at least 10 percent of the civilian population in more than half of the counties where the share increased, compared to just one-fourth of the counties with the largest decreases.

#### TRENDS IN VETERAN STATUS

- In Appalachia, the share of adult civilians who were military veterans declined more than a full percentage point between 2006-2010 and 2011-2015, falling to just above 9 percent (see Tables 11.1 and 11.3). There was little difference in the decrease among the subregions, county types, and the Appalachian versus non-Appalachian portions of the 13 states.
- The decrease in veteran status was more pronounced among middle-aged and older civilians than among younger ones. While the share of veterans fell less than half a percentage point among younger civilians ages 18 to 34, it declined more than two percentage points among civilians ages 35 and over. As veteran status is more prevalent among older residents than younger ones, the movement of cohorts with lower prevalence rates into older ages accounts for much of the decline. (Mortality among the oldest veterans also is a factor, particularly in the decline among persons ages 65 and over.)
- Not surprisingly, the decreased share in veteran status among men has fueled the overall decrease.
  The share of adult men in the Appalachian Region who were veterans fell three percentage points
  between 2006-2010 and 2011-2015, while the share among women barely dropped. Of course, men
  remain far more likely than women to be military veterans—the respective rates in Appalachia were
  18 percent and 1 percent (see Table 11.2).

### APPENDIX A: REFERENCE MAPS

Figure A.1: Appalachian Subregions



Map Title: Appalachian Subregions

Data Source: Appalachian Regional Commission.

The Appalachian Region covers 205,000 square miles and includes all of West Virginia and portions of 12 other states from New York to Mississippi. The 420 counties of the Region are grouped into five subregions, based on similarities in economic and demographic characteristics and geographic location.

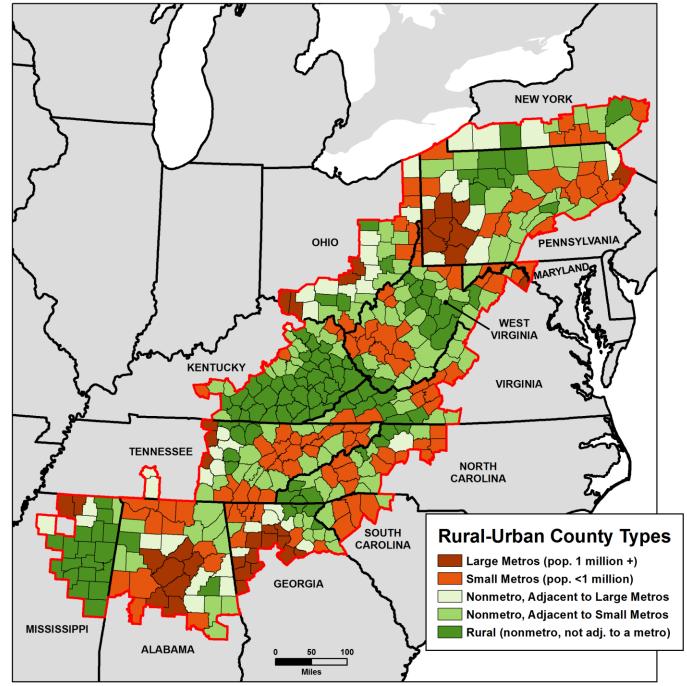


Figure A.2: Rural-Urban County Types in the Appalachian Region

Map Title: Rural-Urban County Types in the Appalachian Region

Data Source: USDA, Economic Research Service, 2013 Urban Influence Codes condensed by ARC.

While Appalachia is a distinct part of the United States, the Region is far from homogeneous, including both rural counties and major metropolitan areas such as Pittsburgh, Birmingham, and parts of suburban Atlanta. This map shows the rural-urban type for each Appalachian county.