The Employment, Earnings, and Occupations of Post-9/11 Veterans

American Community Survey Reports

By Clayton Gumber and Jonathan Vespa Issued November 2020 ACS-46

INTRODUCTION

As the most recent and youngest veteran cohort, Post-9/11 veterans represent a large and growing segment of the veteran population. Among veterans, they are the group who are most likely to be engaged in the labor force today. Yet they also face job markets that are very different from those experienced by veterans of the Vietnam Era or Gulf War when they returned to civilian life.

To better understand the labor market experiences of Post-9/11 veterans, this report looks at their employment, earnings, and occupations between 2014 and 2018.¹ This report focuses on the civilian, noninstitutionalized population between the ages of 18 and 54.² Of the 154.4 million people from this population from 2014-2018, about 3 million were Post-9/11 veterans (see Appendix Table 1 and the text box "Terms and Definitions").

The data in this report come from the 2014-2018 American Community Survey (ACS) 5-year estimates, which pools 5 years of respondent data together to provide better estimates of subgroups, such as detailed occupations. The report also uses the 2018 Census Occupation Code List, which

provides an updated look at the occupations of Post-9/11 veterans.³

HIGHLIGHTS

- Employment. About 80 percent of Post-9/11 veterans were employed. Conversely, only about 75 percent of civilians who never served were employed. Among men, Post-9/11 veterans had a lower unemployment rate than men who never served (4.7 and 5.4 percent, respectively). However, among women, veterans were more likely to be unemployed than nonveterans (4.9 and 4.6 percent, respectively).
- Work characteristics. Among the employed, Post-9/11 veterans were more likely than nonveterans to work year-round, full-time jobs (81 percent compared with 71 percent); to work longer hours per week (43.1 hours compared with 39.4 hours); and to work for the federal, state, or local government (33.3 percent compared with 12.4 percent).
- Enrollment and work history. Among those who were not working, Post-9/11 veterans were more likely than nonveterans to be enrolled in school (32 percent compared with 26.4 percent) and



¹ The U.S. Census Bureau reviewed this data product for unauthorized disclosure of confidential information and has approved the disclosure avoidance practices applied to this release. CBDRB-FY19-245.

² The noninstitutionalized population refers to people who are not residing in institutional group quarters, such as prisons, hospitals, barracks, and nursing homes. This report excludes people living in such facilities.

³ The 2018 Census Occupation Code List (derived from the 2018 Standard Occupation Classification Manual) is available at https://census.gov/topics/employment/industry-occupation/guidance/code-lists.html. For more information on how the Census Occupation Code List is revised, see <a href="https://www2.census.gov/programs-surveys/demo/guidance/industry-occupation/guidance/industry-occupation/revising_the_standard_occupational_classification_2018.pdf.

to have worked in the last 12 months (33.9 percent compared with 26.1 percent).

- Earnings. Post-9/11 veterans out-earn their peers: the median earnings for a Post-9/11 veteran is nearly \$11,000 more per year than a nonveteran (\$46,000 compared with \$35,000).
- Earnings and education. Post-9/11 veterans with less than a college degree had a substantial earnings advantage over nonveterans. Those with at most a high school education earned about \$8,000 more per year, and those with some college earned about \$11,000 more per year than nonveterans with similar levels of education.
- Occupations. Compared with nonveterans, Post-9/11 veterans were more likely to work in several occupation groups: protective services; installation, maintenance, and repair; transportation; computer and mathematical; architecture and engineering; and business and financial operations.
- Most over-represented occupation. Approximately 9 percent of all Post-9/11 veterans worked in protective services—more than three times the proportion of nonveterans employed in the same field.

EMPLOYMENT PATTERNS OF POST-9/11 VETERANS

Post-9/11 veterans are distinctive, standing apart both from other veterans and from the broader population. With a median age of 37 years, they are among the youngest cohort

TERMS AND DEFINITIONS

A **veteran** is an individual who served in the military (even for a short time), but is no longer serving on active duty in the U.S. Army, U.S. Navy, U.S. Air Force, U.S. Marine Corps, or the U.S. Coast Guard.

Post-9/11 veterans served on active duty since September 2001. This report excludes veterans who only served in other eras.

A **civilian** is an individual who is not serving on active duty in the armed forces. It includes those who never served (i.e., a nonveteran)* as well as those who served in the past but are not on active duty now (i.e., a veteran). This report looks at the civilian population and does not include those on active duty in the armed forces.

A **nonveteran** is an individual who has never served in the armed forces.

This report defines the **working-age population** as people who are 18–54 years old. Although the traditional definition includes those up to age 64, this report excludes 55- to 64-year-olds.** Because Post-9/11 veterans are young compared with the traditional working-age population, this report references nonveterans of a similar age range to better compare their work experiences, earnings, and occupations with the broader population. For more information on the sample of people featured in this report and the number of older or institutionalized veterans who were not included in this analysis, see Appendix Table 1.

of veterans.⁴ As a result, they are the most likely to be in the labor force out of all veterans, although they also have the highest rates of service-connected disability and are more likely to be living in or near

poverty than Gulf War veterans.⁵
Compared with the broader
population (see the text box
"Terms and Definitions"), Post9/11 veterans had higher levels
of educational attainment, which
may affect their employment

^{*} This report looks at the 154.4 million people in the civilian, noninstitutionalized population of the United States who are 18-54 years old. The term "civilians who never served" refers specifically to the population of 148.4 million noninstitutionalized adults who were nonveterans during the 2014-2018 period. See Appendix Table 1 for additional information on the sample used in this report.

^{**} The report excludes about 232,000 noninstitutionalized Post-9/11 veterans who were between the ages of 55 and 64 (see Appendix Table 1). Compared with the veterans included in this report, the 232,000 older veterans were more likely to have a college education, to be out of the labor force, and to have a disability.

⁴ In comparison, the median age of Gulf War veterans is 50 and the median age of Vietnam Era veterans is 71.

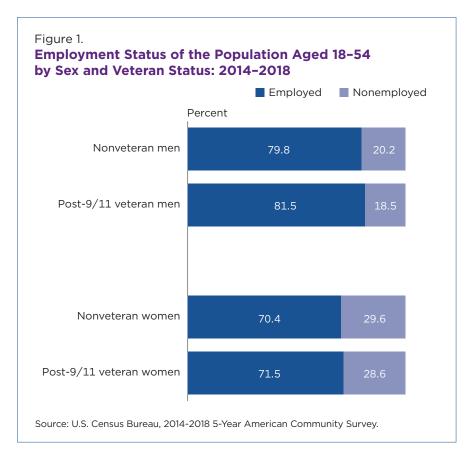
⁵ For more information on the characteristics of veterans from different service periods, see Vespa, 2020, <www.census.gov/library/publications/2020/demo/acs-43.html>.

and earnings, as well as the type of jobs they pursue after returning to civilian life. More than 75 percent of Post-9/11 veterans had some college experience, compared with 63 percent of nonveterans aged 18-54 (see Table 1). Examining education by sex highlights even starker differences. For instance, among men, 76 percent of Post-9/11 veterans had some college education or more, compared with 58 percent of male nonveterans. Among women, 86 percent of Post-9/11 female veterans had some college education, compared with 67 percent of women who never served (see Table 1).

For men and women alike, Post-9/11 veterans were more likely to be employed than the population of nonveterans aged 18-54 (see Figure 1). Among Post-9/11 veterans, nearly 82 percent of men and 72 percent of women were employed, compared with 80 percent and 70 percent of their nonveteran peers, respectively (Figure 1). Overall, this group of veterans was less likely to be unemployed or not in the labor force (Table 1).

Characteristics of the Employed Population: Post-9/11 Veterans Were More Likely to be Employed Full-Time, Year-Round than Nonveterans

Not only were Post-9/11 veterans more likely to be employed, they worked more hours per week, earned more, and were more likely to be enrolled in school than nonveterans. Among the employed, Post-9/11 veterans were more likely than nonveterans to be working full-time, year-round (Table 2a). Post-9/11



veteran men also worked an average 2 hours longer each week compared with nonveteran men, and about 4 hours longer than veteran women. Nonveteran women worked the fewest hours each week, and almost 3 hours less than veteran women.

Employed Post-9/11 veterans were enrolled in college at a higher rate than nonveterans (see Table 2a), consistent with studies showing Post-9/11 veterans are more likely to be enrolled in college than similar nonveterans (Humensky et al., 2013; Kleykamp, 2013). Among employed Post-9/11 veterans, 15 percent of men and 23 percent of women were enrolled in college. Over 75 percent of employed Post-9/11 veterans

had completed some college or more. Compared with men, women had higher levels of educational attainment: 44 percent of employed Post-9/11 veteran women and 38 percent of nonveteran women held a bachelor's degree or higher. Although military enlistment generally delays college enrollment (Martorell et al., 2013), the Post-9/11 GI Bill has significantly increased veterans' access to higher education (Barr, 2015; Zhang, 2018).

Characteristics of the Nonemployed: Post-9/11 Veterans Were More Likely to Have a Disability than Nonveterans

Among people who were not employed (those who were either unemployed or not in the

Table 1.

Characteristics of Post-9/11 Veterans and Nonveterans: 2014–2018
(Civilian, noninstutionalized population, 18 to 54 years old. Numbers in thousands)

			Me	en	Wor	men
Characteristics	Post-9/11		Post-9/11		Post-9/11	
	veterans	Nonveterans	veterans	Nonveterans	veterans	Nonveterans
Total 18 to 54 years old	3,048	148,400	2,521	70,920	526	77,510
Percent of total	100.0	100.0	100.0	100.0	100.0	100.0
Age 18 to 24 years	8.3 43.8 27.9 20.0	20.0 28.1 25.6 26.3	8.0 43.5 27.7 20.9	20.9 28.5 25.4 25.2	9.9 45.3 28.8 15.9	19.2 27.8 25.8 27.2
Median age (years)	34.6	35.7	34.7	35.2	34.0	36.1
Education and Enrollment High school graduate or less Some college, no degree Bachelor's degree or higher Enrolled in school	22.1 47.5 30.3 19.5	37.4 32.5 30.1 15.7	23.8 47.8 28.5 18.2	42.2 30.3 27.5 14.6	14.4 46.3 39.3 25.7	33.1 34.5 32.4 16.7
Race and Hispanic Origin¹ White alone, non-Hispanic. Black alone, non-Hispanic Asian alone, non-Hispanic Other, non-Hispanic Hispanic.	64.8 14.9 2.8 4.3 13.1	57.9 12.6 6.5 3.2 19.8	66.8 13.3 2.8 4.1 13.0	58.1 11.8 6.4 3.1 20.6	55.3 22.3 3.2 5.5 13.6	57.8 13.4 6.6 3.2 19.0
Health Insurance Coverage and Disability ² Uninsured	6.2 13.5	14.7 7.9	6.4 13.8	17.0 7.9	5.0 11.9	12.6 7.9
Employment Status Employed	79.8 20.2 4.8 15.4	74.9 25.1 5.0 20.1	81.5 18.5 4.7 13.7	79.8 20.2 5.4 14.8	71.5 28.5 4.9 23.6	70.4 29.6 4.6 25.0

¹ Federal surveys now give respondents the option of reporting more than one race. Therefore, two basic ways of defining a race group are possible. A group such as White may be defined as those who reported White and no other race (the race-alone or single-race concept) or as those who reported White regardless of whether they also reported another race (the race-alone-or-in-combination concept). This report shows data using the first approach (race alone). Use of the single-race population does not imply that it is the preferred method of presenting or analyzing data. For further information, see the 2010 Census Brief, Overview of Race and Hispanic Origin: 2010 (C2010BR-02) at <www.census.gov/library/publications/2011/dec/c2010br-02.html>.

Source: U.S. Census Bureau, 2014-2018 5-Year American Community Survey.

labor force), Post-9/11 veterans tended to have more education, were more likely to have a disability, and were more likely to have worked recently compared with nonveterans (Table 2b). With some exceptions, these differences also extended to both men and women who were not employed. Just under half of nonemployed Post-9/11 veterans had a disability that stemmed

from their military service, which suggests a strong link between disability and employment.

Looking in more detail at these trends, nonemployed Post-9/11 veterans had higher levels of education than their non-veteran peers, with over half of male and female veterans having completed some college, and 17.5 percent and 28.5 percent, respectively,

holding a bachelor's degree or higher. Over 30 percent of Post-9/11 veterans who were not employed were enrolled in college. Moreover, the enrollment rate for veteran women was about 11 percentage points more than it was for women who did not serve in the Armed Forces. In contrast, enrollment among veteran men who were not employed was lower than

² ACS-defined disabilities are different from a service-connected disability. The former include self-reported difficulty with vision, hearing, mobility, cognitive functioning, independent living, or self-care. A service-connected disability is an injury, disease, or disability that was the result of service in the Armed Forces. Importantly, a veteran with a service-connected disability might not report having a limitation or functional difficulty for ACS-defined disabilities.

Note: Post-9/11 veterans are veterans who have served in the U.S. Armed Forces since September 2001 or later. Veterans who served only in earlier periods are excluded from this table and analysis. Data based on sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see www.census.gov/acs.

their nonveteran peers by about 1 percentage point. Regarding work status, a majority of those not employed were not in the labor force at all, while nonveterans were substantially more likely to have never worked or worked more than 5 years ago.

EARNINGS AND EDUCATION OF POST-9/11 VETERANS

Education is an important factor affecting both employment and earnings. People with higher levels of education are more likely to be employed (U.S. Bureau of Labor Statistics, 2018) and earn more over the course of their lifetime (Tamborini, Kim, and Sakamoto, 2015). This trend extends to those with vocational training and some college experience. Depending on the field of training or study, people with vocational certificates or associate's degrees—notably in physical and health sciences, computer and information services, and engineering and drafting earn as much or more than those with certain bachelor's degrees (Kim and Tamborini, 2019).

These patterns did not always extend to veterans during the 2014 to 2018 period covered in this report. For example, among people with the highest levels of education, a bachelor's degree or higher, Post-9/11 veterans were slightly less likely to be employed than nonveterans, a pattern that held for men and women (see Figure 2).

Nonetheless, Post-9/11 veterans often had greater earnings compared with those who never served. In total, Post-9/11 veterans out-earned nonveterans by about \$11,000 per year (Table 3). However, differences

Table 2a.

Characteristics of the Employed Population: 2014–2018

(Civilian, noninstutionalized population, 18 to 54 years old. Numbers in thousands)

	Me	en	Women		
Characteristics	Post- 9/11 veteran	Non- veteran	Post- 9/11 veteran	Non- veteran	
Total number 18 to 54 years old	2,055	56,570	376	54,600	
Percent of total	100.0	100.0	100.0	100.0	
Age 18 to 24 years. 25 to 34 years. 35 to 44 years. 45 to 54 years.	7.4 43.1 28.5 21.0	15.7 30.1 27.7 26.5	10.0 44.3 29.6 16.1	16.4 28.9 26.7 27.9	
Median age (years)	34.9	36.4	34.2	36.7	
Education and Enrollment High school graduate or less. Some college, no degree. Bachelor's degree or higher. Enrolled in school. Disability Status¹ One or more ACS-defined disabilities. Service-connected disability.	22.5 46.6 31.0 15.2 9.4 31.4	38.6 29.8 31.6 10.0	12.8 43.6 43.6 22.7 7.6 29.5	27.2 34.9 37.9 14.3	
Current Work Status ² Less than full-time, year-round Full-time, year-round Average hours worked per week	17.6 82.4 43.7	23.4 76.6 41.7	26.7 73.3 39.9	35.7 64.3 37.0	
Median earnings (dollars)	48,100	40,790	37,760	30,670	
Class of worker ³ Private sector	63.3 32.1 4.5	80.7 9.8 9.3	56.3 40.2 3.4	78.4 15.2 6.3	

X Not applicable.

Note: Post-9/11 veterans are veterans who have served in the U.S. Armed Forces since September 2001 or later. Veterans who served only in earlier periods are excluded from this table and analysis. Data based on sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see <www.census.gov/acs>.

Source: U.S. Census Bureau, 2014–2018 5-Year American Community Survey.

in annual earnings between veterans and nonveterans were smaller—about \$7,000 per year—when comparsions were made separately among men and women (Table 2a). Further, Post-9/11 veterans had a substantial earnings advantage at every educational level. This advantage was especially pronounced among high school graduates

and those with some college experience but no degree (see Table 3). For example, among those with a high school education or less, Post-9/11 veterans earned about \$34,000 per year, compared with \$26,000 for nonveterans—an earnings advantage of about \$8,000. This advantage grew to almost \$11,000 for those

¹ ACS-defined disabilities are different from a service-connected disability. The former include self-reported difficulty with vision, hearing, mobility, cognitive functioning, independent living, or self-care. A service-connected disability is an injury, disease, or disability that was the result of service in the Armed Forces. Importantly, a veteran with a service-connected disability might not report having a limitation or functional difficulty for ACS-defined disabilities.

 $^{^{\}rm 2}$ Full-time, year-round is defined as working 35 hours or more per week and 50 weeks or more during the year.

³ Excludes unpaid family workers.

with some college education but no degree.

Overall, the difference between earnings of veterans and nonveterans was greatest among those with some college education but no degree (see Table 3). This relationship is roughly consistent with (although no evidence of) Kleykamp's (2013) hypothesis that the earnings advantage of Post-9/11 veterans is stronger among those with lower levels of educational attainment. The Armed Forces may function as a bridging environment that provides individuals with job training and an opportunity to develop skills and abilities that are useful in civilian occupations (Browning et al., 1973). As a result, military service may prove especially beneficial for populations that are typically disadvantaged in the labor market.

The Earnings Advantage of Female Veterans

Veteran women had greater returns to education than veteran men. Among individuals with a high school education or less, female veterans earned about 20 percent more, whereas male veterans earned about 16 percent more, than their nonveteran peers. Furthermore, the veteran wage premium among those with a bachelor's degree or higher only extended to women. Earnings for men with a 4-year college degree were similar regardless of veteran status (see Table 3). Women with a 4-year degree, on the other hand, earned about \$3,500 more per year if they were Post-9/11 veterans, which suggests that military experience

Table 2b.

Characteristics of the Nonemployed Population: 2014–2018

(Civilian, noninstutionalized population, 18 to 54 years old. Numbers in thousands)

<u> </u>				
	Men		Wor	nen
Characteristics	Post-9/11	Non-	Post-9/11	Non-
	veterans	veteran	veterans	veteran
Total number 18 to 54 years old	466	14,360	150	22,910
Percent of Total	100.0	100.0	100.0	100.0
Age 18 to 24 years. 25 to 34 years. 35 to 44 years. 45 to 54 years.	45.1 24.1	41.6 22.0 16.1 20.3	9.6 48.1 26.7 15.7	25.7 25.1 23.7 25.4
Median age (years)	33.5	28.0	33.5	34.7
Education and Enrollment High school graduate or less Some college, no degree Bachelor's degree or higher Enrolled in school	29.4 53.1 17.5 31.6	56.4 32.1 11.4 32.7	18.3 53.2 28.5 33.3	47.3 33.5 19.2 22.4
Disability Status¹ One or more ACS-defined disabilities Service-connected disability	33.3 48.4	23.0 X	22.7 44.1	16.6 X
Current Work Status Unemployed		26.8 73.2	17.3 82.7	15.6 84.4
Last Worked Within past 12 months	35.7 36.5 27.8	31.7 20.7 47.6	28.5 40.8 30.7	22.5 23.7 53.8

X Not applicable.

Note: Post-9/11 Veterans are veterans who have served in the U.S. Armed Forces since September 2001 or later. Veterans who served only in earlier periods are excluded from this table and analysis. Data based on sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see <www.census.gov/acs>.

Source: U.S. Census Bureau, 2014–2018 5-Year American Community Survey.

has a distinctive effect on their earnings.

While this report does not explore why veteran women experienced a greater earnings advantage than veteran men, it is possible that their higher returns were associated with an additional factor such as occupation. For example, veteran women are more likely to work in male-dominated occupations that have higher earnings (e.g., protective services), and as a result, have higher earnings than nonveteran women. Studies

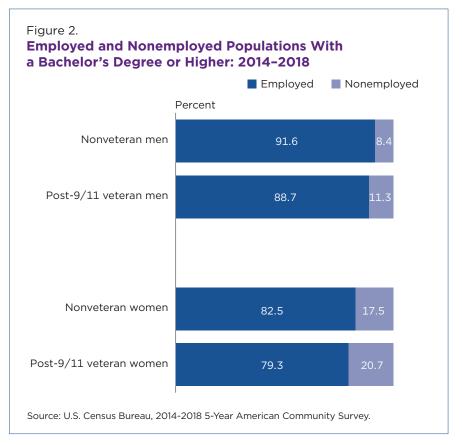
examining veterans' wages also point to the role of occupation as a possible mediating factor for explaining these sex differences in earnings. In one study examining only Post-9/11 veteran women, Padavic and Prokos (2017) found that veterans earned more than those without military service, with occupation accounting for about one-quarter of the earnings difference. Similarly, in a study of adults aged 25-40, Vick and Fontanella (2017) found that veteran men, but not veteran women,

¹ ACS-defined disabilities are different from a service-connected disability. The former include self-reported difficulty with vision, hearing, mobility, cognitive functioning, independent living, or self-care. A service-connected disability is an injury, disease, or disability that was the result of service in the Armed Forces. Importantly, a veteran with a service-connected disability might not report having a limitation or functional difficulty for ACS-defined disabilities.

experienced a wage penalty since veteran men were in direct competition with nonveteran men in the labor market. In contrast, veteran women worked more often in high-paying occupations and less often in low-paying occupations than their nonveteran counterparts, and thus they did not compete. In summary, occupation may be an important factor for explaining earnings differences between veteran men and women.

OCCUPATIONS OF POST-9/11 VETERANS

Among workers who were employed full-time, year-round, over 50 percent of Post-9/11 veterans and nonveterans worked in just six occupation groups (see Figure 3a).6 Of those six groups, both Post-9/11 veterans and nonveterans shared four of them: management (11.1 percent and 11.9 percent, respectively); office and administrative support (8.7 percent and 11.4 percent); business and financial (6.8 percent and 6.3 percent); and production (6.6 percent and 6.5 percent). For the two groups that were not held in common among full-time, year-round workers, Post-9/11 veterans were more often employed in protective services (9.9 percent) and installation, maintenance, and repair (8.8 percent), and nonveterans were more often employed in sales and related (9.4 percent) and healthcare practitioners and technical (6.2 percent).



These data suggest that veterans' military occupational specialty or the training they received while in the Armed Forces may influence their civilian occupation. For example, about one-quarter of enlisted service members had a military occupation in electronic and electrical equipment repair or vehicle and machinery mechanics. A further 13 percent of enlisted service members and 21 percent of officers had an engineering, science, and technical military occupation (Bureau of Labor Statistics, 2019).

Differences in Post-9/11 veterans and nonveterans' occupations also varied by sex (see Figures 3b and 3c). Among full-time, year-round workers, about one-third of veteran men were employed among three occupation groups: management (11.2 percent); protective services (10.7 percent); and installation, maintenance, and repair (9.9 percent). In contrast, about one-third of nonveteran men were employed among management (12.5 percent), construction and extraction (10 percent), and sales and related occupations (9.6 percent).

⁶ Compared with nonveterans, the percentage of Post-9/11 veterans employed full-time, year-round was significantly different for all occupation groups except production.

⁷ Compared with nonveteran men, the percentage of Post-9/11 veteran men employed full-time, year-round was significantly different for all occupation groups except educational instruction and library.

Compared with nonveteran women, the percentage of Post-9/11 veteran women employed full-time, year-round was significantly different for all occupation groups except the following: life, physical, and social science; material moving; legal; community and social service; and management.

Table 3.

Median Yearly Earnings by Educational Attainment: 2014-2018

(In dollars. Civilian, noninstutionalized population, 18 to 54 years old)

			Men		Women	
Earnings and education	Post-9/11		Post-9/11		Post-9/11	_
	veterans	Nonveterans	veterans	Nonveterans	veterans	Nonveterans
Total yearly earnings	46,170	35,360	48,100	40,790	37,760	30,670
Educational Attainment						
High school graduate or less	33,810	25,700	35,310	30,120	25,050	20,570
Some college, no degree	41,040	30,250	42,490	36,450	30,970	25,800
Bachelor's degree or higher	68,060	58,240	72,200	71,720	54,180	50,660

Note: Earnings are shown only for those who are employed. Post-9/11 veterans are veterans who have served in the U.S. Armed Forces since September 2001 or later. Veterans who served only in earlier periods are excluded from this table and analysis. Data based on sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see <www.census.gov/acs>.

Source: U.S. Census Bureau, 2014–2018 5-Year American Community Survey.

Table 4.

Percentage Employed in Select Detailed Occupations Among Currently Employed Post-9/11

Veterans and Nonveterans: 2014–2018

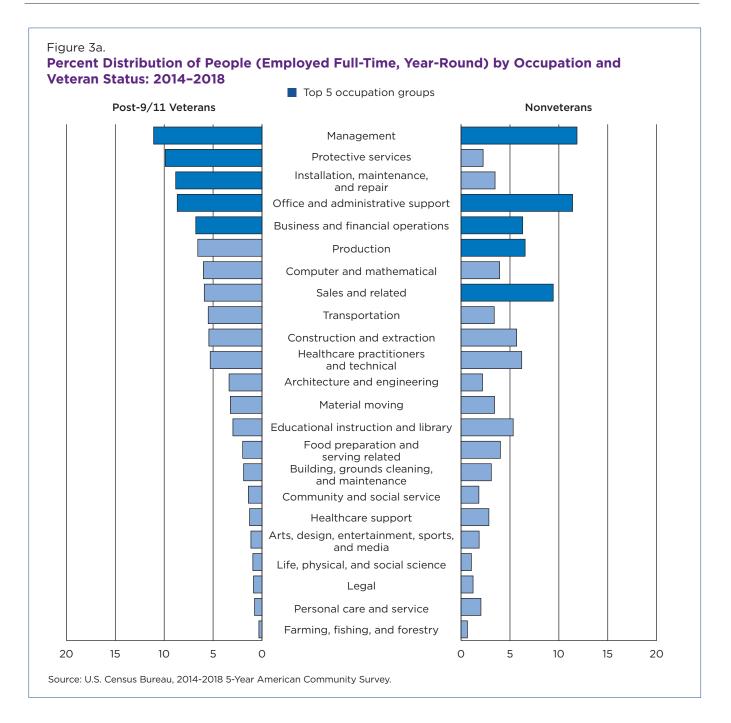
(Civilian, noninstutionalized population, 18 to 54 years old)

Occupations	Percentage of Post-9/11 veterans	Margin of error (±)	Percentage of nonveterans	Margin of error (±)
Management	9.9 3.2 0.8 0.5	0.13 0.08 0.05 0.03	9.5 2.3 0.6 0.4	0.03 0.01 0.01 <0.01
Protective services Police officers Security guards and gambling surveillance officers Correctional officers and jailers	9.1	0.17	2.0	0.01
	3.1	0.10	0.5	0.01
	2.2	0.07	0.6	0.01
	1.2	0.06	0.2	<0.01
Office and administrative support Customer service representatives First-line supervisors of office and administrative support workers Office clerks, general	8.9	0.13	11.4	0.04
	1.4	0.06	2.0	0.01
	1.3	0.05	0.8	0.01
	0.7	0.04	0.9	0.01
Installation, maintenance, and repair	8.1 1.2 0.9 0.8	0.15 0.06 0.05 0.04	2.9 0.1 0.3 0.6	0.01 <0.01 <0.01 0.01
Sales and related. First-line supervisors of retail sales workers Retail salespersons Cashiers	6.6	0.12	10.4	0.03
	1.6	0.06	2.1	0.01
	1.6	0.07	2.3	0.01
	0.7	0.04	2.3	0.02
Production Other production workers First-line supervisors of production and operating workers	6.4 0.9 0.8	0.11 0.04 0.04	5.7 0.8 0.6	0.02 0.01 0.01
Inspectors, testers, sorters, samplers, and weighters Business and financial operations	0.7	0.05	0.5	<0.01
	6.1	0.11	5.3	0.03
	1.1	0.06	0.6	<0.01
	0.7	0.04	1.3	0.01
	0.7	0.04	0.1	<0.01

< Indicates the estimate is smaller than 0.01.

Note: Post-9/11 veterans are veterans who have served in the U.S. Armed Forces since September 2001 or later. Veterans who served only in earlier periods are excluded from this table and analysis. Data based on sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see <www.census.gov/acs>.

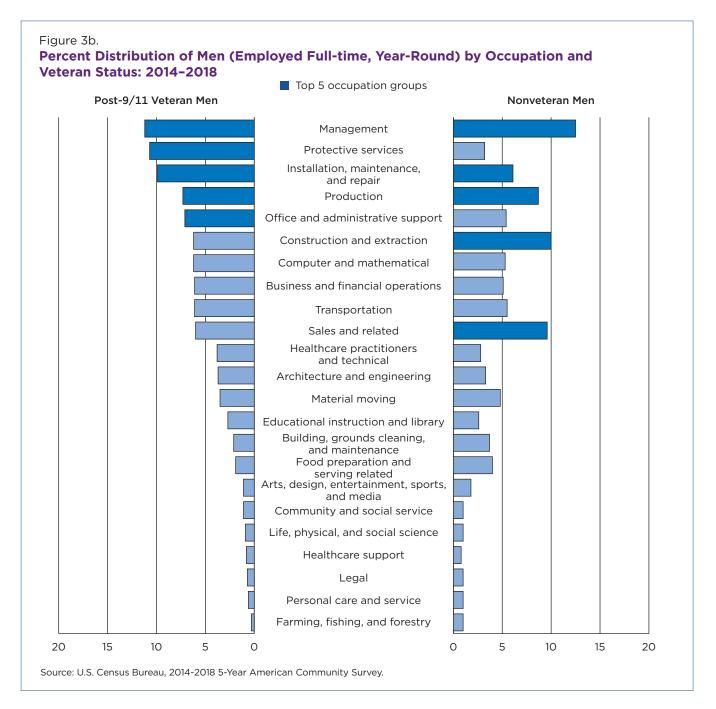
Source: U.S. Census Bureau, 2014-2018 American Community Survey (ACS) 5-year estimates.



While differences among women appear less distinct, the proportion of veterans and nonveterans among the top occupation groups also varied. Over half of veteran women working full-time, year-round were employed in office and administrative support (18.1 percent), healthcare practitioners and technical (14.6 percent),

management (10.7 percent), and business and financial operations (10.6 percent).8 Like their veteran counterparts, nonveteran women were commonly employed in office and administrative support (18.8 percent), management (11.1 percent), and healthcare practitioners and technical (10.4 percent). However, a large proportion of nonveteran women also were employed among sales and related (9.2 percent), and educational instruction and library occupations (8.7 percent).

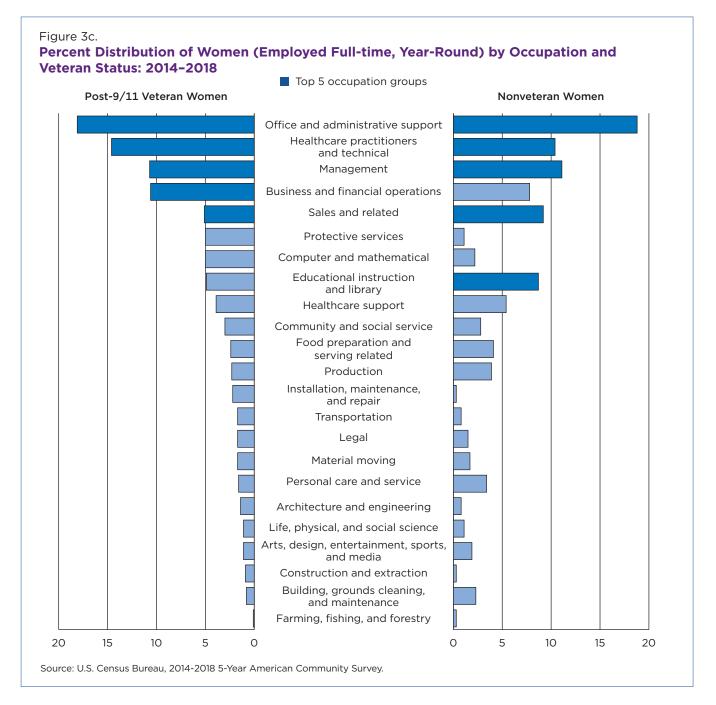
⁸ The percentage of veteran women employed full-time, year-round in management was not significantly different from the percentage employed in business and financial.



Post-9/11 veterans often were employed in occupations whose job duties may overlap with military training. In general, findings were reminiscent of Schulker's (2017) study on veterans' representation in certain occupations. Relative to nonveterans, Post-9/11 veterans

were over-represented in several occupation groups including protective services; installation, maintenance, and repair; transportation; computer and mathematical; architecture and engineering; and business and financial operations (see Figure 4a). Post-9/11 male

veterans were especially overrepresented in protective service occupations and installation, maintenance, and repair occupations. Post-9/11 female veterans were over-represented in protective services as well as healthcare practitioners and technical occupations (see Figures 4b and

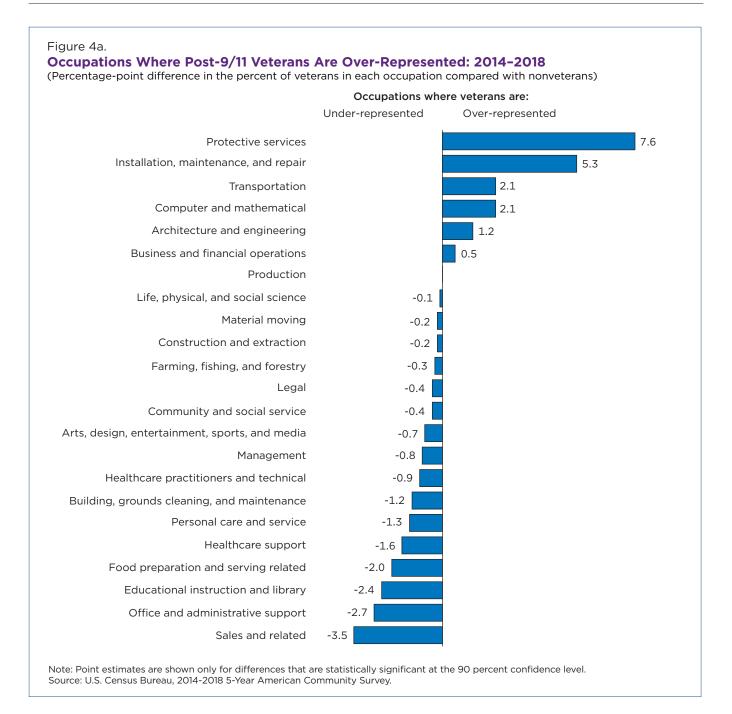


4c). Some of these occupation groups were common among active duty service members as well. About 7 percent of enlisted service members have a military occupation in protective services, whereas 11 percent of officers have a military occupation

in healthcare (Bureau of Labor Statistics, 2019).

Using the 5-year data from the ACS gives us the ability to look at subgroups, such as workers in detailed occupations. Looking at specific jobs among all people who were employed (regardless

of full- or part-time), about 5 percent of all Post-9/11 veterans were employed as police officers or security guards and gambling surveillance officers (see Table 4). In contrast, only 1 percent of all employed nonveterans worked in the same detailed occupations. Post-9/11 veterans

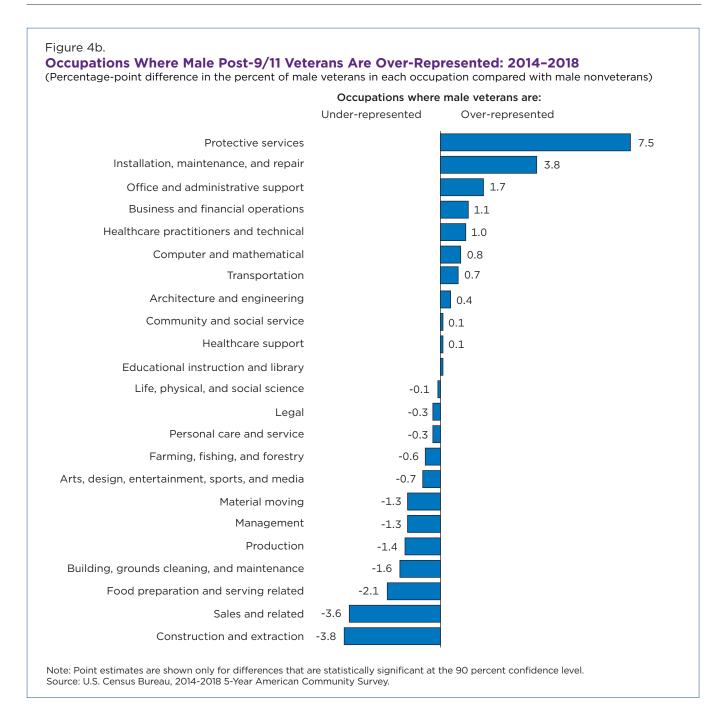


were also over-represented in jobs related to aircraft maintenance and service. They were less commonly employed within the sales and related occupation group, with only 1.6 percent of all Post-9/11 veterans employed as retail salespersons, 1.6 percent as first-line supervisors of retail sales workers, and 0.7 percent as cashiers. Conversely,

a significantly higher percentage of nonveterans worked in the aforementioned occupations (2.3 percent, 2.1 percent, and 2.3 percent, respectively). Due to its broad nature and inclusion of many different kinds of managerial jobs, one common occupation among Post-9/11 veterans

and nonveterans was managers, all other.9

⁹ "Managers, all other" is a diverse occupational category that encompasses a wide range of occupational titles that are not directly mentioned in other managerial categories. Occupational titles in this category include workers found across a variety of specific industries, and also in industries or establishments that were not elsewhere specified. For a detailed accounting of occupational titles within this category, please refer to Census Code 0440 in the Alphabetical Indexes of Industry and Occupation at https://census.gov/topics/employment/industry-occupation/guidance.html>.

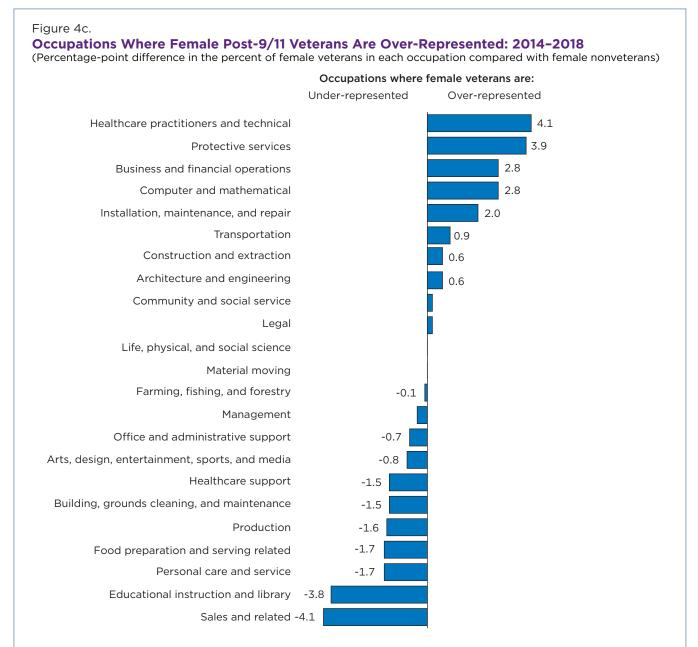


SUMMARY

Post-9/11 veterans represent a unique and growing segment of the veteran population, and they significantly differ from nonveterans in terms of their demographics and employment characteristics. Overall, Post-9/11 veterans, who were younger than those with no military service, had a higher level

of educational attainment and were more likely to be enrolled in school. Furthermore, Post-9/11 veterans were more likely to be employed full-time, year-round relative to nonveterans, had higher median earnings, and worked more hours per week. The report also finds evidence that female veterans had an earnings advantage, especially

among those with a 4-year college degree. Their earnings advantage may stem from the occupations they pursue after returning to civilian life. In particular, female veterans work more often in traditionally maledominated fields with higher pay than women who never served in the military.



Note: Point estimates are shown only for differences that are statistically significant at the 90 percent confidence level. Source: U.S. Census Bureau, 2014-2018 5-Year American Community Survey.

In addition to general employment differences between veterans and nonveterans, Post-9/11 veterans were concentrated in select occupation groups. They were disproportionately represented among the protective services and installation, maintenance, and repair. Post-9/11 veterans often worked in specific occupations within broader occupation groups. Most notably, 5 percent of Post-9/11 veterans were employed as police officers or security guards and gambling surveillance officers. Considered jointly, these findings suggest that Post-9/11 veterans may work in civilian occupations where their military skills could overlap with job duties.

Although this report found that Post-9/11 veterans were more likely to be employed full-time, year-round, and to have an earnings advantage over nonveterans, it did not explore other factors that could affect whether veterans were employed, how much they earned, and what kind of jobs they held. It did not explore interactions between age, education, disability status, or race and ethnicity. It also did not consider the role of work history and experience, specific skills and training learned

in school or the military, or the selectivity that underlies who chooses to serve. Moreover, veteran status is a broad proxy for numerous characteristics and factors that were not directly measured in this report, such as length and branch of service, combat experience, rank, and duties performed while serving, all of which could affect employment and earnings in the civilian labor force. The U.S. Census Bureau's experimental Veteran Employment Outcomes¹⁰ data, which covers only recent Army veterans, could help explore the role of some of these factors. notably rank, military occupation, and years of service. Examining the labor force experiences of Post-9/11 veterans is important for understanding the transition to civilian life as well as the broader well-being of the nation's youngest and most recent group of veterans.

MORE INFORMATION

For more information about veterans of the U.S. Armed Forces, go to the U.S. Census Bureau's Web site on veteran statistics at <www.census.gov/topics/population/veterans.html>. For

more information about industry and occupations, go to <www.census.gov /topics/employment /industry-occupation.html>.

SOURCE AND ACCURACY

Data presented in this report are based on people and households that responded to the ACS in 2014 through 2018, and are subject to sampling and nonsampling error. All comparisons presented in this report have taken sampling error into account and are significant at the 90 percent confidence level unless otherwise noted. Due to rounding, some details may not sum to totals. For information on sampling and estimation methods, confidentiality protection, and sampling and nonsampling errors, please see the "ACS Accuracy of the Data" documents for 2014-2018 located at https://census.gov/programs -surveys/acs/technical -documentation/code-lists .html>.

SUGGESTED CITATION

Gumber, Clayton and Jonathan Vespa, "The Employment, Earnings, and Occupations of Post-9/11 Veterans," *American Community Survey Briefs*, ACS-46, U.S. Census Bureau, Washington, DC, 2020.

¹⁰ See the Veteran Employment
Outcomes Web site for more information:
https://lehd.ces.census.gov/data/veo_experimental.html>.

REFERENCES

Barr, Andrew, "From the Battlefield to the Schoolyard: The Short-term Impact of the Post-9/11 GI Bill," *Journal of Human Resources*, 50: 580–613, 2015.

Browning, Harley L., Sally C. Lopreato, and Dudley L. Poston, "Income and Veteran Status: Variations Among Mexican Americans, Blacks and Anglos," *American Sociological Review,* 38(1): 74-85, 1973.

Kleykamp, Meredith, "Unemployment, Earnings and Enrollment Among Post 9/11 Veterans," *Social Science Research*, 42: 836-851, 2013.

Humensky, Jennifer L., Neil Jordan, Kevin T. Stroupe, and Denise M. Hynes, "How Are Iraq/ Afghanistan-Era Veterans Faring in the Labor Market," *Armed Forces & Society*, 39(1): 158–183, 2013.

Kim, ChangHwan and Christopher R. Tamborini, "Are They Still Worth It? The Long-Run Earnings Benefits of an Associate Degree, Vocational Diploma or Certificate, and Some College," RSF: The Russel Sage Foundation Journal of the Social Sciences, 5(3): 64-85, 2019. Martorell, Paco, Trey Miller, Lindsay Daugherty, and Mark Borgschulte, "Effects of Military Service on Earnings and Education, Revisited: Variation by Service Duration, Occupation, and Civilian Unemployment," RAND Corporation, 2014.

Padavic, Irene, and Anastasia Prokos, "Aiming High: Explaining the Earnings Advantage for Female Veterans," *Armed Forces* & Society, 43(2): 368–386, 2017.

Schulker, David, "The Recent Occupation and Industry Employment Patterns of American Veterans," *Armed Forces & Society*, 43(4): 695-710, 2017.

Tamborini, Christopher R., ChangHwan Kim, and Arthur Sakamoto, "Education and Lifetime Earnings in the United States," *Demography*, 52(4): 1383–1407, 2015.

U.S. Bureau of Labor Statistics, "Table 5.1: Unemployment Rates and Earnings by Educational Attainment: 2018," *U.S. Bureau* of Labor Statistics, Washington, D.C., 2018.

U.S. Bureau of Labor Statistics, "Occupational Outlook Handbook," *Military Careers*, U.S. Bureau of Labor Statistics, Washington, D.C., 2019, https://www.bls.gov/ooh/military/military-careers.htm>. U.S. Census Bureau, "Veteran Employment Outcomes,"

U.S. Census Bureau, Washington,
D.C., https://lehd.ces.census.gov/doc/VEO_Tech_Doc.pdf>.

U.S. Department of Veterans Affairs, "Profile of Post-9/11 Veterans: 2016," https://www.va.gov/vetdata/docs//specialReports/Post_911 _Veterans_Profile_2016.pdf>.

Vespa, Jonathan E., "Those Who Served: America's Veterans from World War II to the War on Terror," U.S. Census Bureau, *American Community Survey Reports*, ACS-43, Washington, D.C., 2020, https://www.census.gov/content/census/en/library/publications/2020/demo/acs-43.html>.

Vick, Brandon, and Gabrielle Fontanella, "Gender, Race, and the Veteran Wage Gap," *Social Science Research*, (61): 11–28, 2017.

Zhang, Liang, "Veterans Going to College: Evaluating the Impact of the Post-9/11 GI Bill on College Enrollment," *Educational Evaluation and Policy Analysis*, 40(1): 82-102, 2018.

Appendix Table 1.

Total Civilian and Veteran Populations Aged 18 Years and Over¹: 2014–2018 (Numbers in thousands)

Populations		Margin of		Margin of
Populations	Number	error (±)	Percent	error (±)
Total population aged 18 years and over	249,300	153.4	100.0	Х
Nonveterans	230,700	113.3	92.5	0.02
Veterans	18,610	48.1	7.5	0.02
Post-9/11 veterans	3,357	16.7	1.3	0.01
Civilian population ²	245,100	140.4	98.3	0.01
Nonveterans	226,500	100.2	90.8	0.02
Veterans	18,610	48.1	7.5	0.02
Post-9/11 veterans	3,357	16.7	1.3	0.01
Civilian, noninstitutionalized population ³	241,400	140.7	96.8	0.01
Nonveterans	223,100	100.4	89.5	0.02
Veterans	18,300	47.9	7.3	0.02
Post-9/11 veterans	3,328	16.6	1.3	0.01
Civilian, noninstitutionalized population aged 18-64	194,900	119.3	78.2	0.01
Nonveterans	185,600	98.3	74.4	0.01
Veterans	9,280	28.6	3.7	0.01
Post-9/11 veterans	3,280	16.4	1.3	0.01
Civilian, noninstitutionalized population aged 18-54	154,400	95.8	61.9	<0.01
Nonveterans	148,400	82.5	59.5	0.01
Veterans	5,970	21.2	2.4	0.01
Post-9/11 veterans	3,048	15.5	1.2	0.01

X Not applicable.

Source: U.S. Census Bureau, 2014-2018 5-Year American Community Survey.

< Indicates the estimate is smaller than 0.01.

¹ Excludes Puerto Rico.

² Excludes active duty military and reservists.

³ Excludes people living in institutionalized group quarters, such as prisons, correctional facilities, barracks, nursing facilities and hospitals. Note: Post-9/11 veterans are veterans who have served in the U.S. Armed Forces since September, 2001. Veterans who served only in earlier periods are excluded from this table and analysis. Data based on sample. For information on confidentiality protection, sampling error, nonsampling error, and definitions, see <www.census.gov/acs>.

Appendix Table 2.

Margins of Error for Characteristics of Post-9/11 Veterans and Nonveterans: 2014-2018

(Civilian, noninstutionalized population, 18 to 54 years old. Numbers in thousands)

			Men		Wor	men
Characteristics	Post-9/11		Post-9/11		Post-9/11	
	veterans	Nonveterans	veterans	Nonveterans	veterans	Nonveterans
Total number 18 to 54 years old	15.5	82.5	14.0	36.1	5.3	49.6
Percent of total	Χ	X	X	X	X	×
Age 18 to 24 years. 25 to 34 years. 35 to 44 years. 45 to 54 years. Median age (years)	0.13	0.01	0.14	0.01	0.34	0.01
	0.19	0.01	0.21	0.02	0.51	0.01
	0.20	0.01	0.22	0.01	0.47	0.01
	0.17	0.01	0.20	0.01	0.38	0.01
	0.04	<0.01	0.05	0.01	0.10	0.01
Education and Enrollment High school graduate or less	0.19	0.17	0.22	0.17	0.36	0.16
	0.23	0.03	0.25	0.05	0.48	0.04
	0.22	0.17	0.24	0.16	0.50	0.18
	0.16	0.04	0.19	0.05	0.53	0.04
Race and Hispanic Origin¹ White alone, non-Hispanic. Black alone, non-Hispanic Asian alone, non-Hispanic Other, non-Hispanic Hispanic	0.24	0.01	0.24	0.01	0.50	0.01
	0.14	0.01	0.16	0.02	0.39	0.01
	0.06	0.01	0.07	0.01	0.19	0.01
	0.10	0.02	0.10	0.02	0.25	0.02
	0.16	0.01	0.17	0.01	0.42	0.01
Health Insurance Coverage and Disability ² Uninsured One or more ACS-defined disabilities	0.11	0.14	0.13	0.16	0.23	0.12
	0.13	0.02	0.15	0.03	0.35	0.02
Employment Status Employed	0.19	0.07	0.21	0.07	0.51	0.08
	0.19	0.07	0.21	0.07	0.51	0.08
	0.10	0.02	0.10	0.02	0.24	0.02
	0.16	0.06	0.18	0.06	0.47	0.07

X Not applicable.

Note: Post-9/11 veterans are veterans who have served in the U.S. Armed Forces since September 2001 or later. Veterans who served only in earlier periods are excluded from this table and analysis. A margin of error is a measure of an estimate's variability. The larger the margin of error in relation to the size of the estimate, the less reliable the estimate. This number when added to or subtracted from the estimate forms the 90 percent confidence interval.

Source: U.S. Census Bureau, 2014-2018 5-Year American Community Survey.

¹Federal surveys now give respondents the option of reporting more than one race. Therefore, two basic ways of defining a race group are possible. A group such as White may be defined as those who reported White and no other race (the race-alone-or-single-race concept) or as those who reported White regardless of whether they also reported another race (the race-alone-or-in-combination concept). This report shows data using the first approach (race alone). Use of the single-race population does not imply that it is the preferred method of presenting or analyzing data. For further information, see the 2010 Census Brief, Overview of Race and Hispanic Origin: 2010 (C2010BR-02) at <www.census.gov/library/publications/2011/dec/c2010br-02.html>.

² ACS-defined disabilities are different from a service-connected disability. The former include self-reported difficulty with vision, hearing, mobility, cognitive functioning, independent living, or self-care. A service-connected disability is an injury, disease, or disability that was the result of service in the Armed Forces. Importantly, a veteran with a service-connected disability might not report having a limitation or functional difficulty for ACS-defined disabilities.

Appendix Table 3.

Margins of Error for Characteristics of the Employed Population: 2014–2018

(Civilian, noninstutionalized population, 18 to 54 years old. Numbers in thousands)

	Me	en	Women		
Characteristics	Post- 9/11 veteran	Non- veteran	Post- 9/11 veteran	Non- veteran	
Total number 18 to 54 years old	12.3	75.6	4.3	92.9	
Percent of total	X	X	X	Χ	
Age 18 to 24 years 25 to 34 years 35 to 44 years 45 to 54 years	0.15 0.22 0.24 0.22	0.03 0.02 0.02 0.02	0.37 0.63 0.64 0.46	0.02 0.03 0.02 0.03	
Median age (years)	0.05	0.01	0.12	0.01	
Education and Enrollment High school graduate or less. Some college, no degree. Bachelor's degree or higher Enrolled in school Disability Status¹ One or more ACS-defined disabilities. Service-connected disability.	0.24 0.27 0.27 0.18 0.15 0.30	0.19 0.06 0.18 0.05	0.41 0.59 0.59 0.51 0.34 0.65	0.15 0.06 0.19 0.05	
Current Work Status ² Less than full-time, year-round Full-time, year-round Average hours worked per week Median earnings (dollars)	0.22 0.22 0.06 260	0.05 0.05 0.01 85	0.51 0.51 0.13 516	0.07 0.07 0.01 43	
Class of Worker ³ Private sector Local, state, or federal government Self-employed	0.28 0.26 0.12	0.06 0.07 0.03	0.66 0.67 0.24	0.08 0.08 0.03	

X Not applicable.

Note: A margin of error is a measure of an estimate's variability. The larger the margin of error in relation to the size of the estimate, the less reliable the estimate. This number when added to or subtracted from the estimate forms the 90 percent confidence interval.

Source: U.S. Census Bureau, 2014-2018 5-Year American Community Survey.

¹ ACS-defined disabilities are different from a service-connected disability. The former include self-reported difficulty with vision, hearing, mobility, cognitive functioning, independent living, or self-care. A service-connected disability is an injury, disease, or disability that was the result of service in the Armed Forces. Importantly, a veteran with a service-connected disability might not report having a limitation or functional difficulty for ACS-defined disabilities.

 $^{^{\}rm 2}$ Full-time, year-round is defined as working 35 hours or more per week and 50 weeks or more during the year.

³ Excludes unpaid family workers.

Appendix Table 4.

Margins of Error for Characteristics of the Nonemployed Population: 2014–2018

(Civilian, noninstutionalized population, 18 to 54 years old. Numbers in thousands)

	Me	Men		Women		
Characteristics	Post- 9/11 veterans	Non- veteran	Post- 9/11 veterans	Non- veteran		
Total number 18 to 54 years old	5.9	46.7	3.3	47.6		
Percent of total	X	Х	X	Х		
Age 18 to 24 years 25 to 34 years 35 to 44 years 45 to 54 years Median age (years)	0.35 0.61 0.48 0.47 0.14	0.12 0.07 0.09 0.08 0.05	0.58 0.87 0.78 0.66	0.06 0.06 0.05 0.06		
Education and Enrollment High school graduate or less Some college, no degree Bachelor's degree or higher Enrolled in school	0.54 0.56 0.33 0.53	0.11 0.09 0.08 0.13	0.74 1.00 0.86 1.03	0.15 0.07 0.14 0.08		
Disability Status ¹ One or more ACS-defined disabilities Service-connected disability	0.59 0.59	0.09 X	0.89 0.94	0.05 X		
Current Work Status Unemployed	0.47 0.47	0.10 0.10	0.76 0.76	0.06 0.06		
Last Worked Within past 12 months	0.56 0.58 0.66	0.16 0.13 0.25	0.77 0.98 0.94	0.12 0.18 0.28		

X Not applicable.

Note: A margin of error is a measure of an estimate's variability. The larger the margin of error in relation to the size of the estimate, the less reliable the estimate. This number when added to or subtracted from the estimate forms the 90 percent confidence interval.

Source: U.S. Census Bureau, 2014–2018 5-Year American Community Survey.

¹ ACS-defined disabilities are different from a service-connected disability. The former include self-reported difficulty with vision, hearing, mobility, cognitive functioning, independent living, or self-care. A service-connected disability is an injury, disease, or disability that was the result of service in the Armed Forces. Importantly, a veteran with a service-connected disability might not report having a limitation or functional difficulty for ACS-defined disabilities.

Appendix Table 5.

Margins of Error for Median Yearly Earnings by Educational Attainment: 2014-2018

(In dollars. Civilian, noninstutionalized population, 18 to 54 years old)

			Men		Women	
Earnings and education	Post-9/11		Post-9/11		Post-9/11	
	veterans	Nonveterans	veterans	Nonveterans	veterans	Nonveterans
Total yearly earnings	238	75	260	85	516	43
Educational Attainment						
High school graduate or less	420	22	292	31	796	37
Some college, no degree	162	32	280	75	366	36
Bachelor's degree or higher	476	75	585	148	598	52

Note: Earnings are shown only for those who are employed. Post-9/11 veterans are veterans who have served in the U.S. Armed Forces since September 2001 or later. Veterans who served only in earlier periods are excluded from this table and analysis. A margin of error is a measure of an estimate's variability. The larger the margin of error in relation to the size of the estimate, the less reliable the estimate. This number when added to or subtracted from the estimate forms the 90 percent confidence interval.

Source: U.S. Census Bureau, 2014-2018 5-Year American Community Survey.