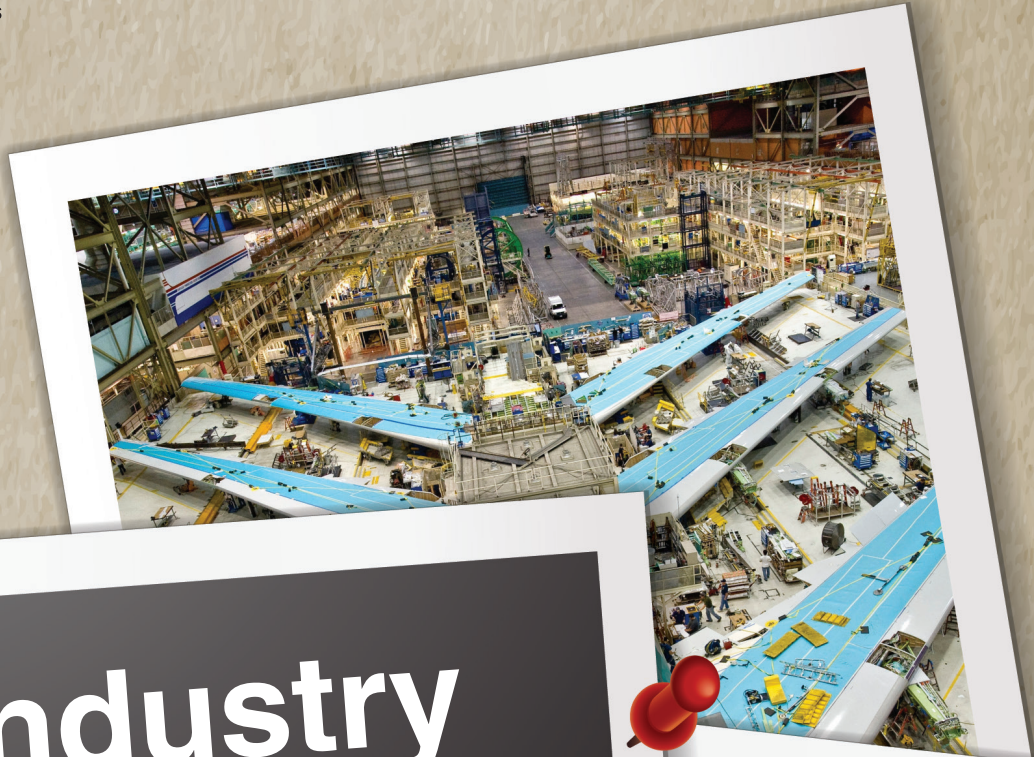




U.S. Department of Transportation
Office of the Secretary of Transportation
Bureau of Transportation Statistics



Industry Snapshots: Uses of Transportation 2017



Summary of GDP Contribution and Transportation Uses

Sector	Contribution to GDP ¹ (2016 current dollars)	Use of Transportation ² (2016 current dollars)	Major mode used	Amount of transportation required to produce a dollar of output	Workforce - Transportation and material moving occupations ³	Freight Moved by Sector ⁴		
						Values	Tons	Ton-miles
Natural Resources and mining	\$438.2 billion (2.4%)	\$32.2 billion (3.4%)	Truck	4.2¢	132,330 (12.4%)	\$99.9 billion	2.9 billion	859.3 billion
Utilities	\$287.1 billion (1.5%)	\$18.9 billion (2.0%)	Pipeline	4.9¢	8,330 (1.5%)	N/A	N/A	N/A
Construction	\$792.5 billion (4.3%)	\$44.8 billion (4.7%)	Truck	2.9¢	218,650 (3.3%)	N/A	N/A	N/A
Manufacturing	\$2,183 billion (11.7%)	\$201.1 billion (21.1%)	Truck	3.6¢	969,070 (7.9%)	\$5.7 trillion	4.2 billion	1.3 trillion
Wholesale and retail trade	\$2,199.5 billion (11.8%)	\$277.9 billion (29.2%)	Truck	9¢	2,216,750 (10.2%)	\$6.1 trillion	3.8 billion	723.2 billion
Information and services	\$9,761.9 billion (52.4%)	\$246.5 billion (25.9%)	Truck	10.5¢	2,529,770 (3.1%)	N/A	N/A	N/A
Government	\$2,399.8 billion (12.9%)	\$129.5 billion (13.6%)	Air, rail, and water	3.8¢	389,810 (4.1%)	N/A	N/A	N/A

NOTE: Table presents latest data available, as of March 2018.

SOURCE: Data for this table is drawn from figures and tables presented throughout this publication.

¹ Numbers in parenthesis are a percentage of total GDP.

² Numbers in parenthesis are a percentage of total transportation use by non-transportation sectors.

³ Numbers in parenthesis are a percentage of total sector workforce.

⁴ Shipments data from the U.S. Department of Transportation, Bureau of Transportation Statistics, Commodity Flow Survey 2012 covers only business establishments in the following industries: mining, manufacturing, wholesale trade, and select retail and services.

N/A= not applicable



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INDUSTRY SNAPSHOTS: USES OF TRANSPORTATION 2017

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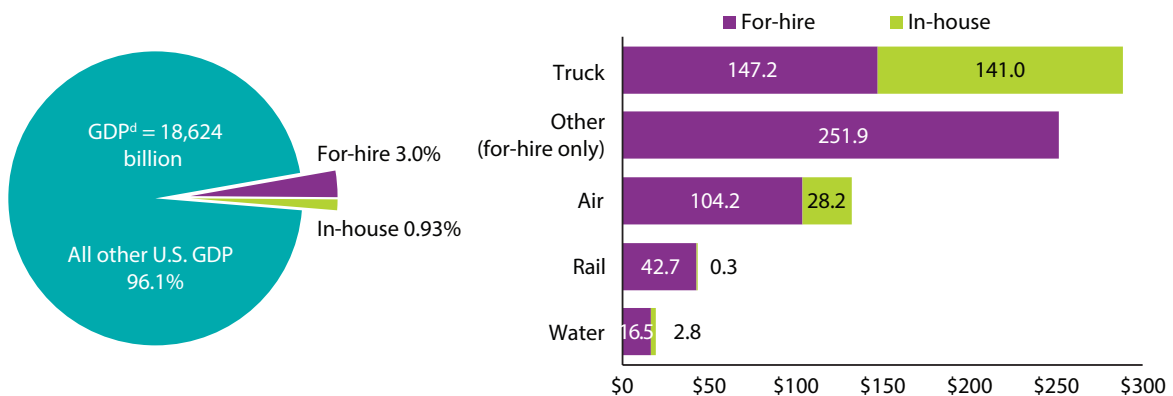
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CHAPTER 1 INTRODUCTION

The Bureau of Transportation Statistics (BTS) estimates that transportation contributed \$1,066.9 billion to the economy in 2016. Of this \$1,066.9 billion, purchased transportation services (for-hire transportation) contributed \$562.4 billion, transportation carried out by non-transportation industries for their own purposes (in-house transportation) contributed \$172.3 billion, and households contributed \$332.2 billion in operating their own automobiles. BTS measures this contribution to the gross domestic product in the Transportation Satellite Accounts (TSAs). The most current TSAs are for 2016¹. This report focuses on the for-hire and in-house transportation services used by non-transportation industries.

Figure 1-1 Contribution of For-Hire and Business-Related In-House Transportation Activity to U.S. Gross Domestic Product (GDP), 2016 (current dollars)



NOTES: (a) In-house transportation is business-related transportation. Business-related transportation includes privately owned and operated vehicles of all body types, used primarily on public rights of way, and the supportive services to store, maintain, and operate those vehicles. (b) For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. (c) Other for-hire transportation includes: pipeline, transit and ground passenger transportation, including State and local government passenger transit; sightseeing transportation and transportation support; courier and messenger services; and warehousing and storage). (d) The TSAs also show the contribution of transportation carried out by households through the use of their private motor vehicles (known as household production of transportation services (HPTS). The contribution of HPTS is not shown in the figure. For more information, see: https://www.bts.gov/transportation_satellite_accounts

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at www.bts.gov, as of March 2018.

Measurement Method and Meaning

BTS produces the TSAs, which provide a comprehensive measure of transportation activity (e.g., a railroad hired by a business to move the business' freight to a customer, trucking carried out by

¹ The TSAs are based on the Bureau of Economic Analysis' (BEA) Input-Output (I-O) Accounts. BEA produces detailed (benchmark) I-O data for every fifth year. BEA releases less detailed (annual) data for the years between the benchmarks. At the time of this publication, the 2007 benchmark data are the most recent detailed data available to the Bureau of Transportation Statistics (BTS) for creating the TSAs. BTS produced TSAs through 2016 (using BEA's latest data in combination with the 2007 benchmark data) and will revise the 2012-2016 TSAs when BEA releases detailed data for the year 2012.

grocers to move goods from distribution centers to stores and depreciation from households driving personal motor vehicles) in the United States. BTS builds on the Bureau of Economic Analysis's (BEA's) input-output (I-O) accounts. The I-O accounts show the value of all for-hire transportation in the United States and the industries using for-hire transportation. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis, such as air carriers, railroads, transit agencies, common carrier trucking companies, and pipelines. Part of the TSAs reorganizes the I-O accounts to show the dollar value of transportation activity carried out by non-transportation industries for their own purposes (known as business-related in-house transportation). For-hire and business-related in-house transportation activity contributed \$734.8 billion to the economy in 2016 (figure 1-1).

The TSAs also show the value of transportation carried out by households through the use of their private motor vehicles (known as household production of transportation services (HPTS)². The I-O accounts do not show the dollar value of in-house transportation activity or HPTS.

The TSAs use the same structure as the U.S. I-O accounts and consist of four tables, quantifying transportation's role and impact.

1. make table: measures the value of transportation services that each transportation industry *makes*,
2. use table: measures the amount of transportation *used* by each industry and sector in the economy and the contribution of each industry and sector to the economy,

² For more information, see: <https://www.bts.gov/transportation-satellite-accounts>

3. direct requirements table: measures the amount of transportation *required* to produce one dollar of each product, and
4. total requirements table: measures the inputs *required* to produce one dollar of transportation.

This report uses information from the TSAs to highlight the role of for-hire and business-related in-house transportation in the production process for all of the non-transportation sectors listed in the U.S. I-O accounts:

- natural resources and mining,
- manufacturing,
- construction,
- utilities,
- wholesale and retail trade,
- services, and
- government

For each sector, information is presented, using the latest available data³, on:

- the sector's contribution to gross domestic product (GDP) – nationally and by State in 2016,
- the sector's use of transportation by mode in 2016,
- the amount of transportation the sector requires to produce one dollar of output in 2016,
- the number of transportation (e.g., airline and commercial pilots, bus drivers, etc.) and material moving (e.g., cleaners of vehicles,

³ Latest data as of March 30, 2018.

dredge operators, etc.) workers employed by the sector in 2016,

- the median annual wage for selected transportation occupations in the sector in 2016,
- the number of trucks and number of truck miles accumulated by the sector in 2002, and
- shipment characteristics (for selected sectors) in 2012.

TSAs data are revised for 2008 to 2015 with the latest BEA data. Due to changes in the source data, the numbers in this release are not comparable to those in our previous release.

CHAPTER 2 NATURAL RESOURCES AND MINING SECTOR



This chapter provides an overview of the contribution of the natural resources and mining sector to the economy and the use of transportation services by the sector.

The natural resources and mining sector consists of two related subsectors: (1) the agriculture, forestry, fishing and hunting subsector, which engages in growing crops, raising animals, harvesting timber, and harvesting fish and other animals from a farm, ranch, or their natural habitats and (2) the mining,

quarrying and oil and gas extraction subsector, which extracts naturally occurring mineral solids, such as coal and ores; liquid minerals, such as crude petroleum; and gases, such as natural gas.¹

Table 2-1 Overview of the Natural Resources and Mining Sector's Contribution to Gross Domestic Product (GDP) and Use of Transportation

Natural Resources and Mining Sector	Value	Year (latest year data is available)
Contribution to GDP	\$438.2 billion	2016
Use of transportation	\$32.2 billion	2016
Amount of transportation required to produce a dollar of output	4.2¢	2016
Number of transportation and material moving workers		
Agriculture, Forestry, Fishing and Hunting	39,860	2016
Mining, quarrying, and oil and gas extraction	92,470	2016
Transportation and material moving workers as percent of sector's work force		
Agriculture, Forestry, Fishing and Hunting	9.6%	2016
Mining, quarrying, and oil and gas extraction	14.2%	2016
Median annual wage of transportation and material moving workers		
Agriculture, Forestry, Fishing and Hunting	\$27,590	2016
Mining, quarrying, and oil and gas extraction	\$43,230	2016
Number of trucks used	2,418 thousand	2002
Truck miles accumulated	27,532 million	2002
Shipments made by mining industry (excluding oil and gas)		
Value	\$99.9 billion	2012
Tons	2.9 billion	2012
Ton-miles	859.3 billion	2012
Average miles per shipment	47 billion	2012

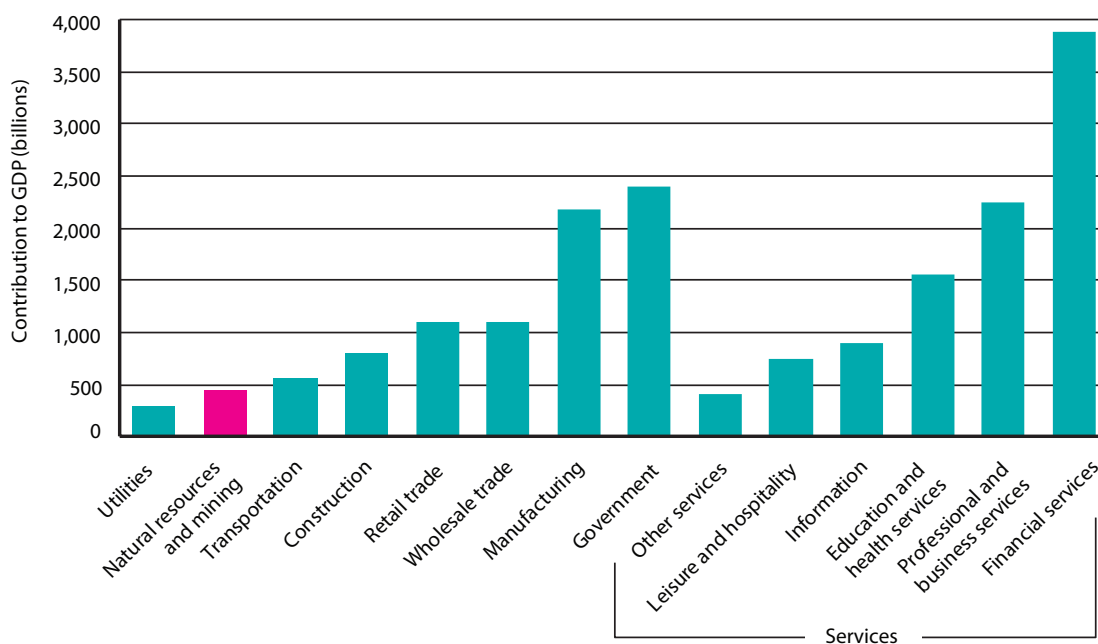
NOTE: Table presents latest data available, as of March 2018

*Data on number of trucks and truck miles accumulated was last collected in the Vehicle Inventory and Use Survey for 2002.

SOURCE: Data for this table is drawn from figures and tables presented throughout this chapter.

¹ U.S. Department of Labor, Bureau of Labor Statistics, Industries at a Glance, www.bls.gov/iag/tgs/iag_index_naics.htm, as of March 30, 2018.

Figure 2-1 Natural Resources and Mining Sector's Contribution to Gross Domestic Product, 2016



NOTE: 2016 GDP = \$18,624 billion

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry, available at <http://bea.gov> as of March 2018.

The natural resources and mining sector uses less transportation services than any of the other sectors except utilities in absolute dollars. But on the per dollar of output basis, this sector requires more transportation services than most of the other sectors. The sector relies heavily on truck transportation services, shipping the most tons and largest value of product by truck, and employing the largest number of transportation workers as heavy and tractor-trailer truck drivers (see table 2-1).

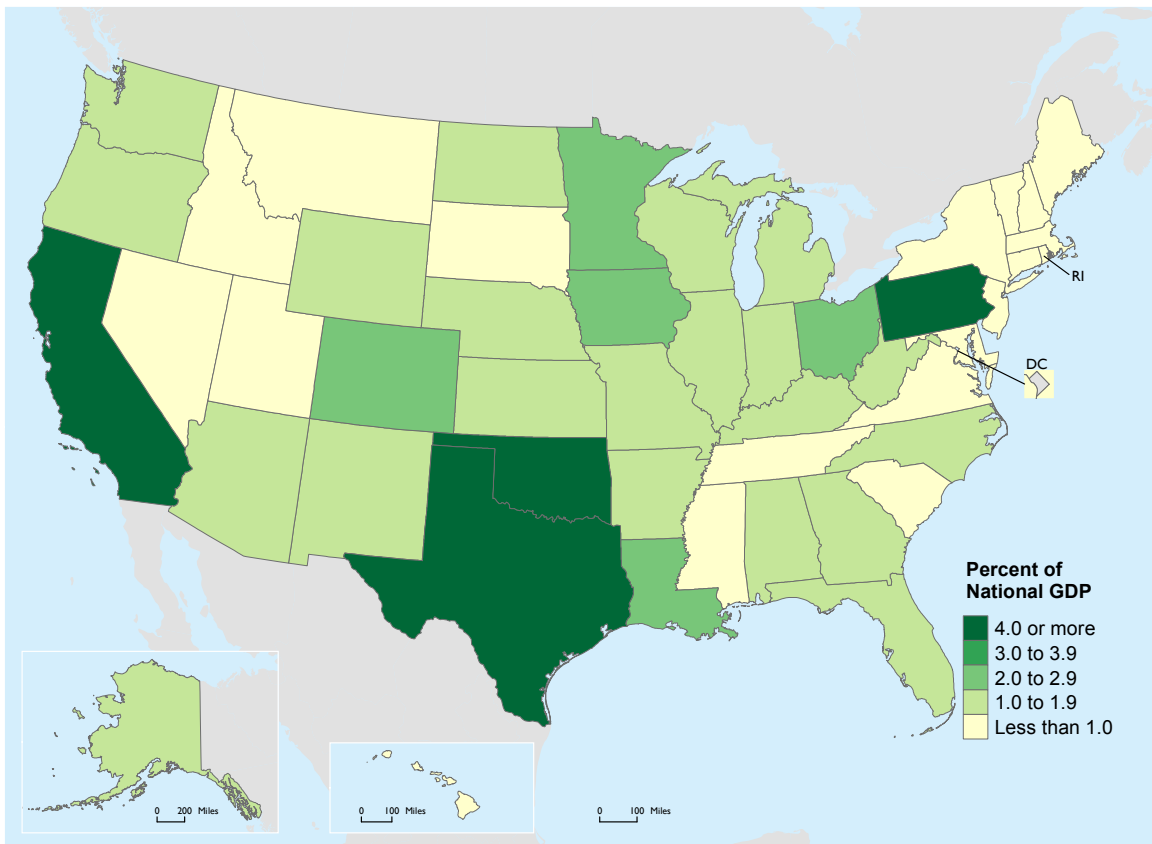
In 2016 the natural resources and mining sector contributed \$438.2 billion (2.4 percent) to the national economy, as measured by gross domestic product (GDP) (figure 2-1). The sector contributed less than other sectors to the economy but generates the raw materials other sectors need to produce finished products. The manufacturing

sector, for example, purchases wheat from the natural resources and mining sector to produce bread.

The largest dollar value of natural resources and mining activity occurred in Texas (\$122.6 billion) followed by California (\$44.3 billion), Oklahoma (\$21.3 billion), and Pennsylvania (\$19.4 billion)—each of which accounted for 4 percent or more of national activity in the natural resources and mining sector in 2016 (figure 2-2, table 2-2). This is primarily driven by mining, quarrying, and oil and gas extraction in Texas, Oklahoma, and Pennsylvania; and agriculture in California.

Computing the percent of natural resources and mining sector activity as a percent of a gross state product (GSP), rather than as a share of GDP, also provides useful insights to U.S. production. Nationally, Texas produced the most natural

Figure 2-2 State Contributions to Natural Resources and Mining Related GDP (percent of national GDP related to natural resources and mining), 2016



SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

Table 2-2 States Contributing 4.0 Percent or More to National GDP Related to Natural Resources and Mining in 2016

State	Natural resources and mining (Natural resources and mining related GDP = \$438.2 billion)			All products and services (Total national GDP = \$18.5 trillion)	
	Natural resources and mining related GDP (billions)	Percent of national GDP related to natural resources and mining	Rank (1=contributes most to national GDP related to natural resources and mining, 51=least)	Dollar contribution to national GDP (billions)	Rank (1=contributes most to national GDP, 51=least)
Texas	122.6	28.0	1	1,599.3	2
California	44.3	10.1	2	2,622.7	1
Oklahoma	21.3	4.9	3	181.3	30
Pennsylvania	19.4	4.4	4	719.8	6

NOTE: This table presents the latest available data which do not sum to latest available industry totals as shown in figures 1-1 and 2-1. Data shown in figures 1-1 and 2-1 are based on U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry table, available at <http://bea.gov> as of March 2018.

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

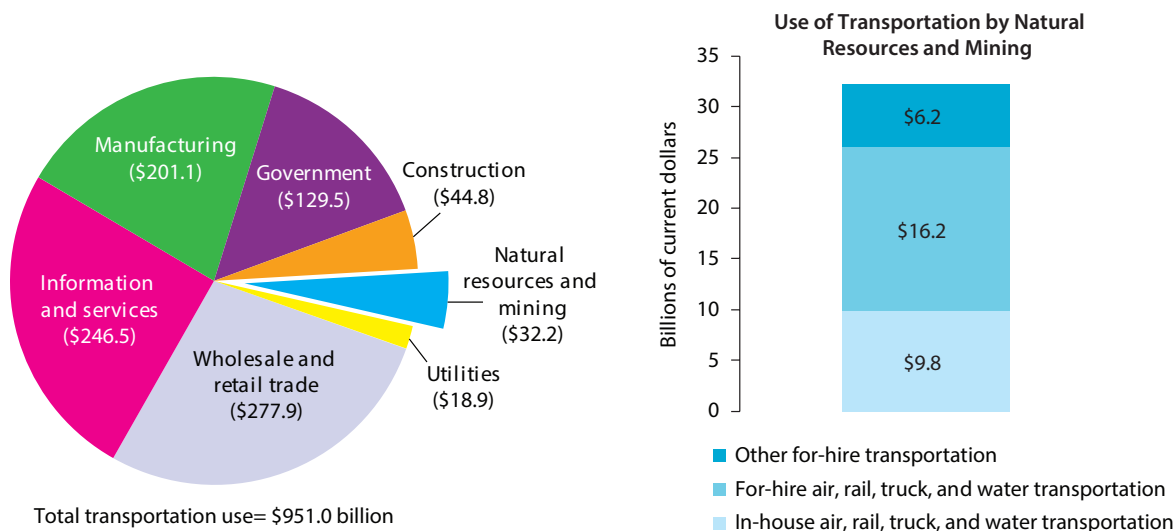
resources and mining products in 2016. However, natural resources and mining activity accounted for a smaller share of GSP in Texas (7.7 percent) than in Wyoming (21.6 percent), Alaska (16.2 percent), and North Dakota (14.6 percent) —the states where natural resources and mining activity accounted for the largest share of GSP. Natural resources and mining activity accounted for a smaller share of GSP in Texas than in Wyoming, Alaska, and North Dakota due to substantial manufacturing activity in Texas. Manufacturing activity accounted for 14.0 percent (\$218.3 billion) of GSP in Texas, while it accounted for only 6.5 percent of GSP in Wyoming (\$2.5 billion), 3.1 percent of GSP in Alaska (\$1.6 billion), and 7 percent of GSP in North Dakota (\$3.8 billion) in 2016. (see Appendix A)

The natural resources and mining sector was the second smallest user of transportation services in 2016 (\$32.2 billion), using almost 2 times more transportation services than the utilities sector (the smallest user of transportation services) in 2016. Looking at air, rail, truck, and water transportation, the natural resources and mining sector used slightly more for-hire services (\$16.2 billion) than in-house (\$9.8 billion) operations (figure 2-3)².

The natural resources and mining sector used \$32.2 billion of transportation services in 2016 (figure 2-4). In 2016, the sector used:

² Data for previous years have been revised since last release. Due to changes in the source data, the numbers in this release is not comparable to those in our previous release.

2-3. Use of Transportation by the Natural Resources and Mining Sector, 2016 (current dollars, billions)



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries.

“Other” for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government passenger transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

- Primarily truck transportation services (e.g., in acquiring seed or moving agricultural output to silos or mining products to the railhead), which accounted for 57.3 percent (\$18,467 million) of all transportation services used by the sector.
- Less in-house truck transportation operations (\$8,995 million) than for-hire truck transportation services (\$9,472 million), with for-hire truck transportation operations accounting for nearly third (29.4 percent) of all transportation services used (\$9,472

million out of \$32,204 million). In-house truck transportation consists of the trucking operations carried out by farms with their own trucks, for instance, in moving wheat to the mill.

- Air, rail, and water transportation services (used for instance, to move grain or coal on barges) summed to 23.5 percent (\$7,570 million) of all the transportation services used by the sector, a majority of which is for-hire (\$6,763 million).

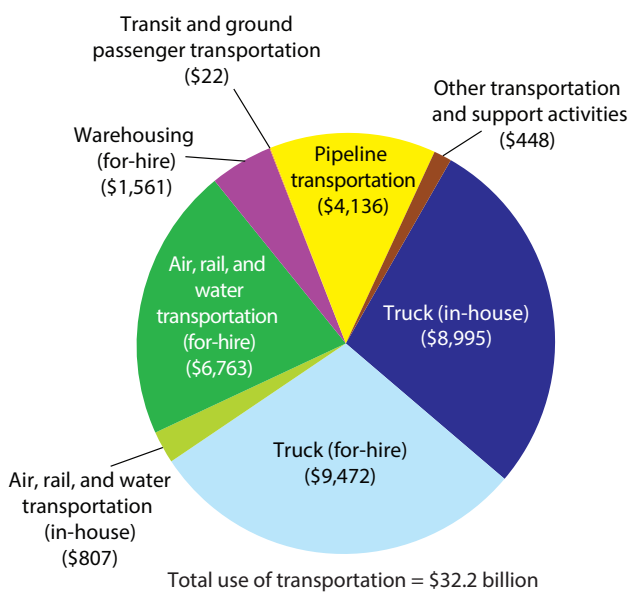
- A significant amount of pipeline transportation, which accounted for 12.8 percent (\$4,136 million) of the transportation services.

- A smaller amount of for-hire transit and ground passenger transportation (e.g., bus transportation purchased for farm laborers) (0.1 percent, or \$22.0 million) than any other transportation mode.

The natural resources and mining sector required more transportation services in producing output than the average sector in 2016, albeit substantially less transportation services than the sector depending the most on transportation services. In 2016, the natural resources and mining sector required 4.2¢ worth of transportation services to produce one dollar of output, while the most dependent sector (wholesale and retail trade) required 9.0¢ worth of transportation services to produce one dollar of output (figure 2-5).

The overall transportation requirement to produce one dollar of output in

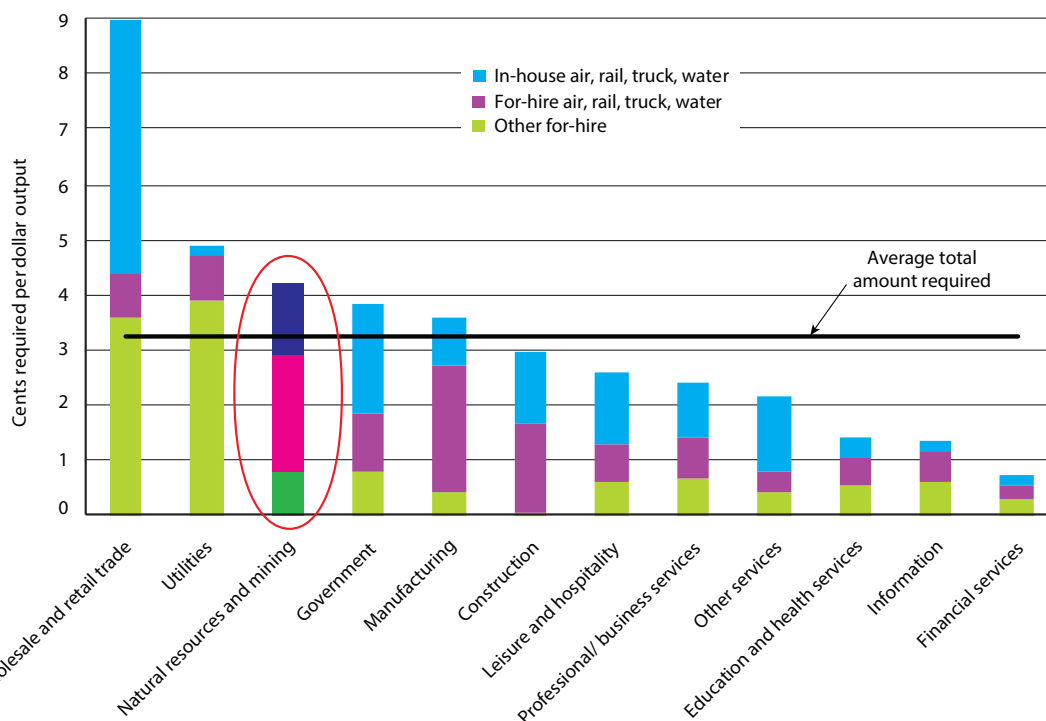
Figure 2-4 Natural Resources and Mining Sector's Use of Transportation by Mode, 2016 (current dollars, millions)



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. Transit and passenger ground transportation excludes State and local government passenger transit. Other transportation includes sightseeing transportation.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Figure 2-5 Transportation Required Per Dollar of Output by the Natural Resources and Mining Sector, 2016



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by non-transportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

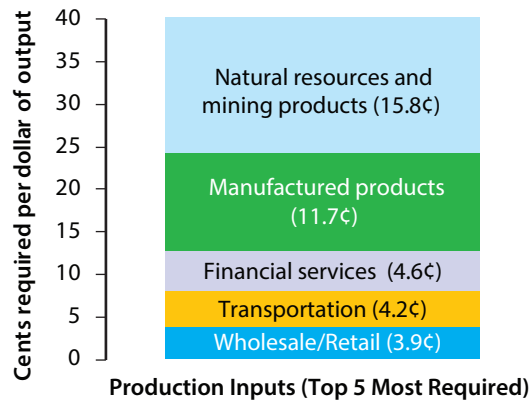
SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

2016 for the natural resources and mining sector (4.2¢) was relatively modest compared to other inputs. Transportation services were the fourth most important input. Natural resources and mining products, including support activities (e.g., geophysical surveying and mapping services used in mining), were the most important input, requiring 15.8¢ worth of natural resources and mining products to produce one dollar of output (figure 2-6).

The natural resources and mining sector consists of both agricultural and mining activities. In 2016 the agriculture, forestry, fishing, and hunting

industry (the "agriculture industry") employed 39,860 transportation and material moving workers, accounting for 9.6 percent of its entire work force. The mining, quarrying, and oil and gas extraction industry (the "mining industry") employed 92,470 transportation and material moving workers, accounting for 14.2 percent of its entire work force (figure 2-7). Transportation workers include motor vehicle operators, ship engineers, aircraft pilots and flight engineers, etc. Material moving workers support transportation activities and include occupations such as cleaners of vehicles and ship loaders.

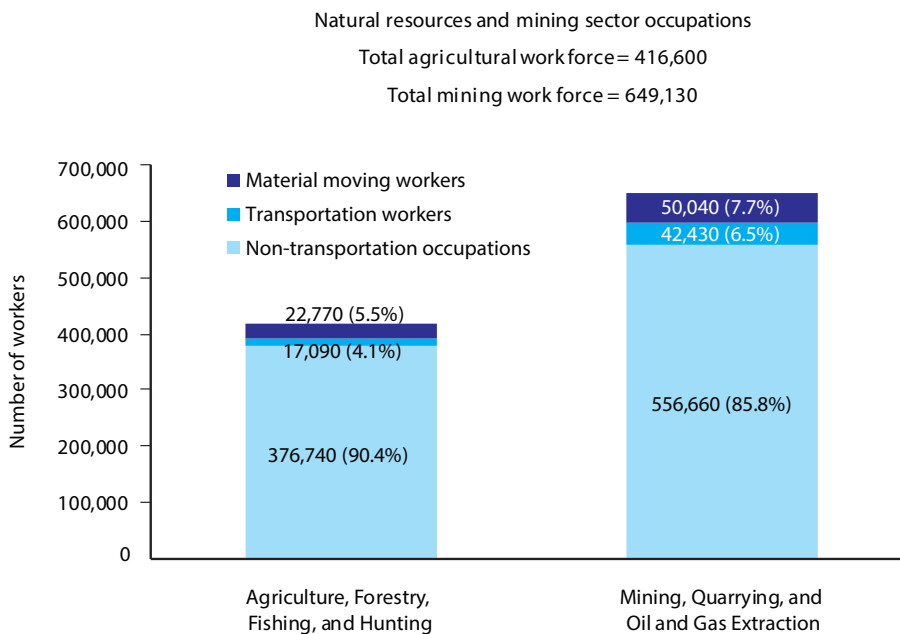
Figure 2-6 Top 5 Most Required Inputs by the Natural Resources and Mining Sector to Produce a Dollar of Output, 2016



NOTE: Transportation includes in-house and for-hire. The natural resources and mining sector requires 1.3 cents per dollar of output of in-house transportation and 2.9 cents per dollar of output of for-hire transportation. TSAs data are revised for 2008 to 2016 with latest BEA data. Due to changes in the source data, the numbers in this release are not comparable to those in our previous release.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Figure 2-7 Number of Workers Employed in Natural Resources and Mining Sector by Occupation, 2016



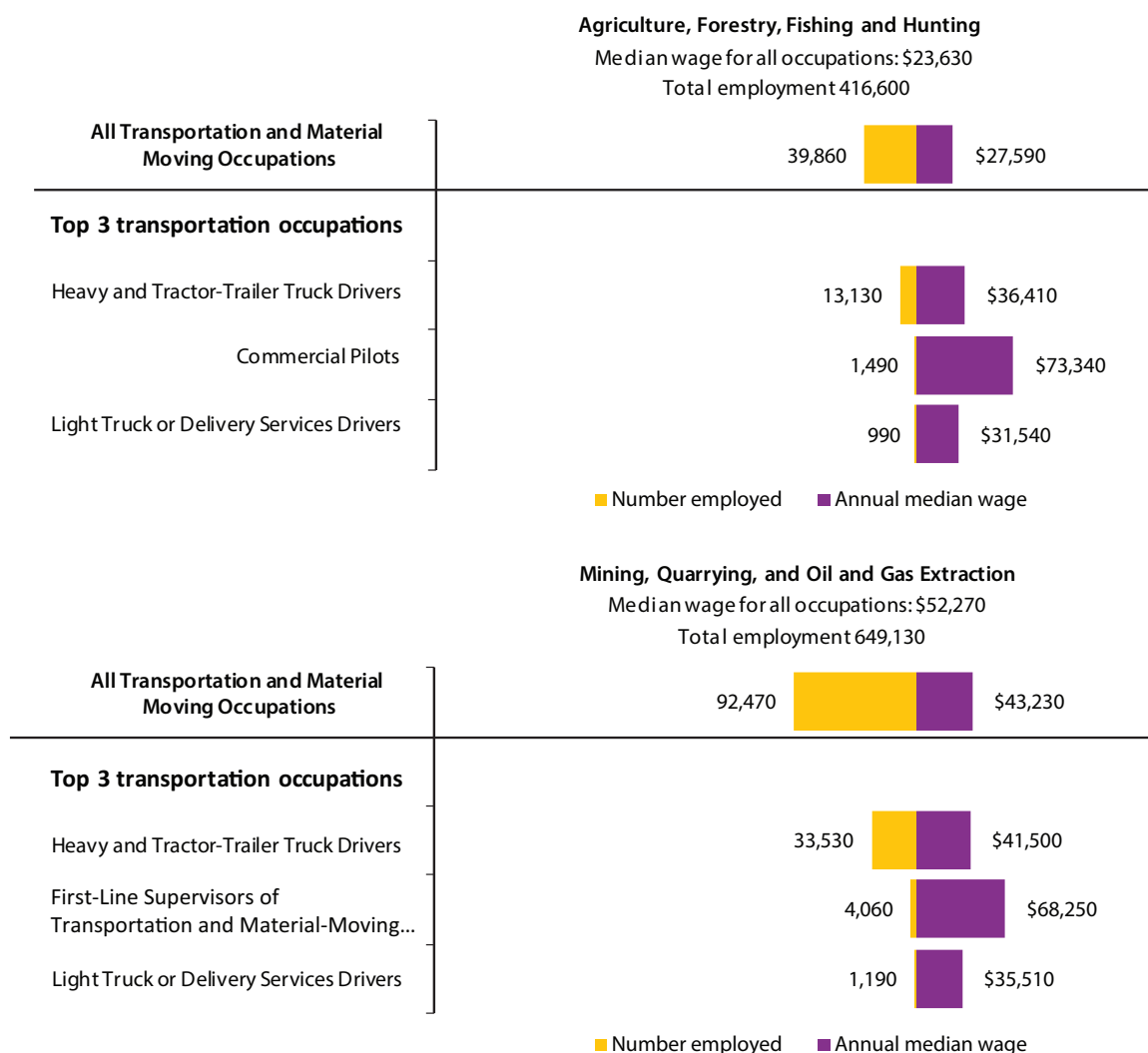
NOTE: Total for transportation occupations includes supervisors of material moving workers, which could not be separated from supervisors of transportation workers.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

Transportation and material moving workers in the agriculture industry earned a median wage of \$27,590 in 2016, while workers of all occupations in the agriculture industry earned a lower median wage of \$23,630. Transportation and material moving workers in mining industry earned a median wage of \$43,230 in 2016, while workers of all occupations in the mining industry earned a higher median wage of \$52,270 (figure 2-8).

The agriculture and mining industries employed the largest number of transportation workers as heavy and tractor-trailer truck drivers. Heavy and tractor-trailer truck drivers accounted for 32.9 percent of all transportation and material moving occupations in the agriculture industry and 36.3 percent of all transportation and material moving occupations in the mining industry. In the agriculture industry, heavy and tractor-trailer

Figure 2-8 Median Annual Wage and Employment for Most Common Transportation Occupations (Top 3) in Natural Resources and Mining Sector, 2016



NOTE: Top three transportation occupations are the transportation occupations employing the largest number of workers and are selected from detailed occupation group in Bureau of Labor Statistics Occupational Employment and Wages table. Material moving occupations not included in the selection of the top three transportation occupations. First-line supervisors of machine and vehicle operators includes first-line supervisors of material moving occupations.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

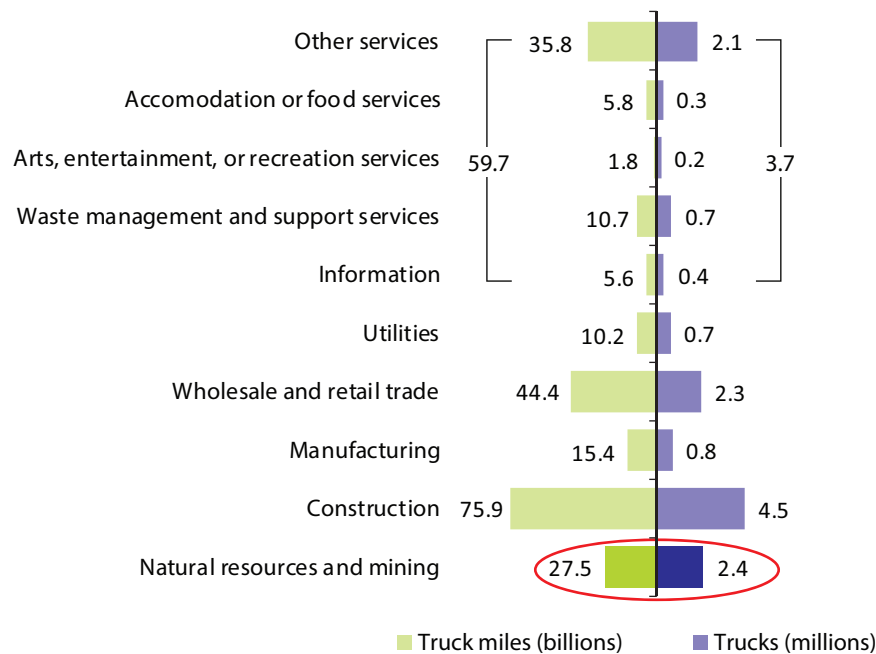
truck drivers earned a median wage of \$36,410, while workers of all occupations in the agriculture industry earned a lower median wage of \$23,630. In the mining industry, heavy and tractor-trailer truck drivers earned a median wage of \$41,500, while workers of all occupations in the mining industry earned a higher median wage of \$52,270 (figure 2-8).

The 2002 Vehicle Inventory and Use Survey (VIUS) is the most recent survey of vehicle ownership and use by industry. According to the 2002 VIUS, the natural resources and mining sector operated 2.4 million trucks —the second largest number of trucks used by an industry. The other services industry and the wholesale and retail trade industry operated fewer trucks than the natural resources and mining industry but accumulated more miles (figure 2-9).

The 2012 Commodity Flow Survey (CFS) is the most recent survey of freight movement. It shows that the mining (excluding oil and gas) industry shipped 2.9 billion tons of raw materials and finished goods domestically, valued at \$99.9 billion, and accounted for 859.3 billion ton-miles. Trucks carried 60.0 percent of the tonnage shipped by the mining industry and 44.6 percent of the value but accounted for only 8.3 percent of ton-miles. The mining industry, however, tended to use modes other than truck to ship goods long distances. Rail ton-miles exceeded the ton-miles of all other modes and accounted for 79.0 percent of all ton-miles. The average shipment distance was shorter by truck (37 miles per shipment) than by all other modes and longest by air (2,732 miles per shipment) (figure 2-10).

The CFS does not provide shipment characteristics for the natural resources industry.

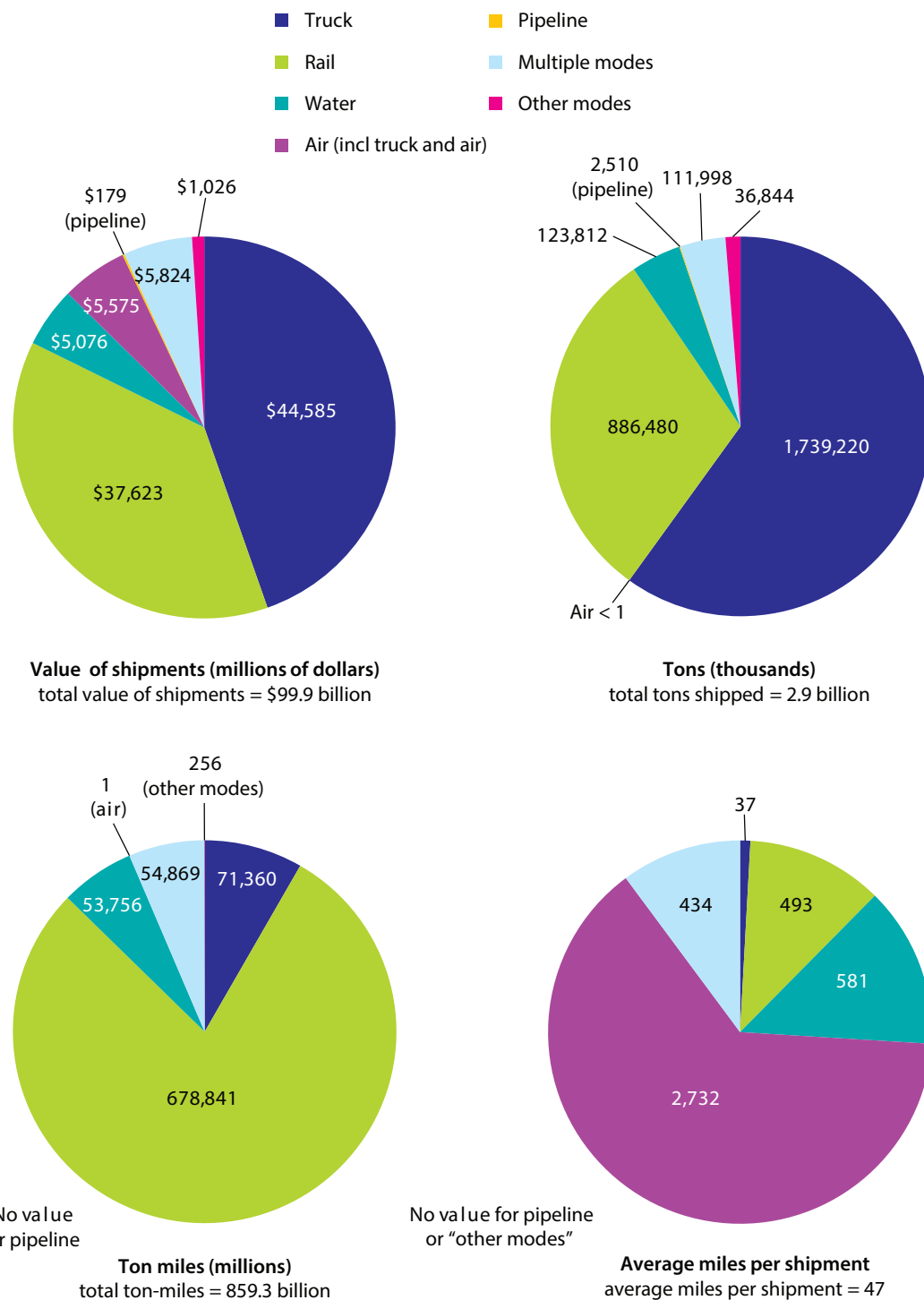
Figure 2-9 Trucks Used and Truck Miles Accumulated for Business by the Natural Resources and Mining Industry, 2002



NOTE: Totals for trucks in use only.

SOURCE: U.S. Census Bureau, 2002 Economic Census Vehicle Inventory and Use Survey, Table 2a, available at <https://www.census.gov/prod/ec02/ec02tv-us.pdf> as of Aug. 2012

Figure 2-10 Characteristics for Shipments Made by Mining (excluding oil and gas) Industry by Mode of Transportation, 2012



NOTE: Value for modes may not sum to total due to data suppression and rounding.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Commodity Flow Survey 2012, available at www.bts.gov as of October 2015.

CHAPTER 3 UTILITIES SECTOR



This chapter provides an overview of the contribution of the utilities sector to the economy and the use of transportation by the sector. The utilities sector consists of establishments providing electric power, natural gas, steam supply, water supply, and sewage removal. Electric power includes generation, transmission, and distribution; natural gas includes distribution; steam supply includes provision and/or distribution; water supply includes treatment and distribution; and sewage removal includes collection,

treatment, and disposal of waste through sewer systems and sewage treatment facilities.¹

The utilities sector uses less transportation services than all other sectors in absolute dollars, but per dollar of output requires more transportation services than most other sectors. The sector uses more dollars of pipeline transportation than any other mode. The utilities sector employs the largest number of workers as heavy tractor-trailer truck drivers.

In 2016 the utilities sector contributed \$287.1 billion (1.5 percent) to the national economy, as measured by gross domestic product (GDP) (table 3-1 and figure 3-1). The sector contributed the least to the economy but generates and distributes the energy other sectors need to produce goods and services.

Table 3-1 Overview of the Utilities Sector’s Contribution to Gross Domestic Product (GDP) and Use of Transportation

Utilities	Value	Year (latest year data is available)
Contribution to GDP	\$287.1 billion	2016
Use of transportation	\$18.9 billion	2016
Amount of transportation required to produce a dollar of output	4.9¢	2016
Number of transportation and material moving workers	8,330	2016
Transportation and material moving workers as percent of sector’s work force	1.5%	2016
Median annual wage of transportation and material moving workers	\$53,220	2016
Number of trucks used	679 thousand	2002
Truck miles accumulated	10,245 million	2002

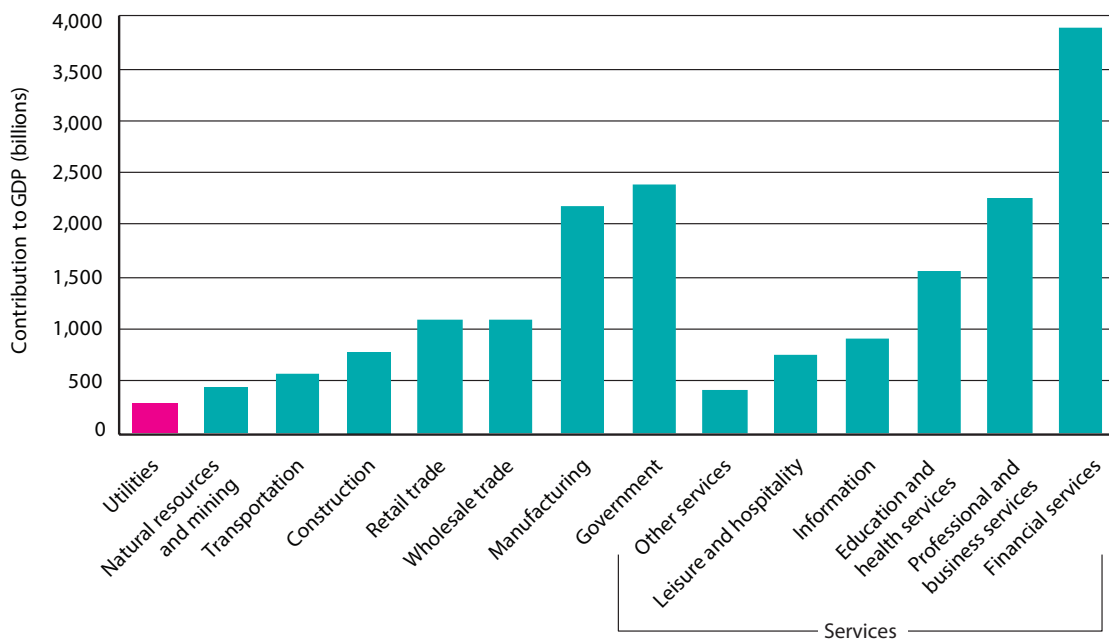
NOTE: Table presents latest data available, as of March 2018.

*Data on number of trucks and truck miles accumulated was last collected in the Vehicle Inventory and Use Survey for 2002.

SOURCE: Data for this table is drawn from figures and tables presented throughout this chapter.

¹ U.S. Department of Labor, Bureau of Labor Statistics, Industries at a Glance, www.bls.gov/iag/tgs/iag_index_naics.htm, as of March 30, 2018.

Figure 3-1 Utilities Sector's Contribution to Gross Domestic Product, 2016



NOTE: 2016 GDP = \$18,624 billion

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry, available at <http://bea.gov> as of March 2018.

The largest amount of activity in the utilities sector occurred in Texas (\$34.9 billion), followed by California (\$28.8 billion), New York (\$19 billion), Florida (\$15.1 billion), Illinois (\$12.7 billion), Pennsylvania (\$11.5 billion), and Ohio (\$11.4)—each of which accounted for 4 percent or more of national activity in the utilities sector in 2016 (figure 3-2, table 3-2). The States contributing the most to national activity in utilities are States with large gross state product (GSP) (table 3-2).

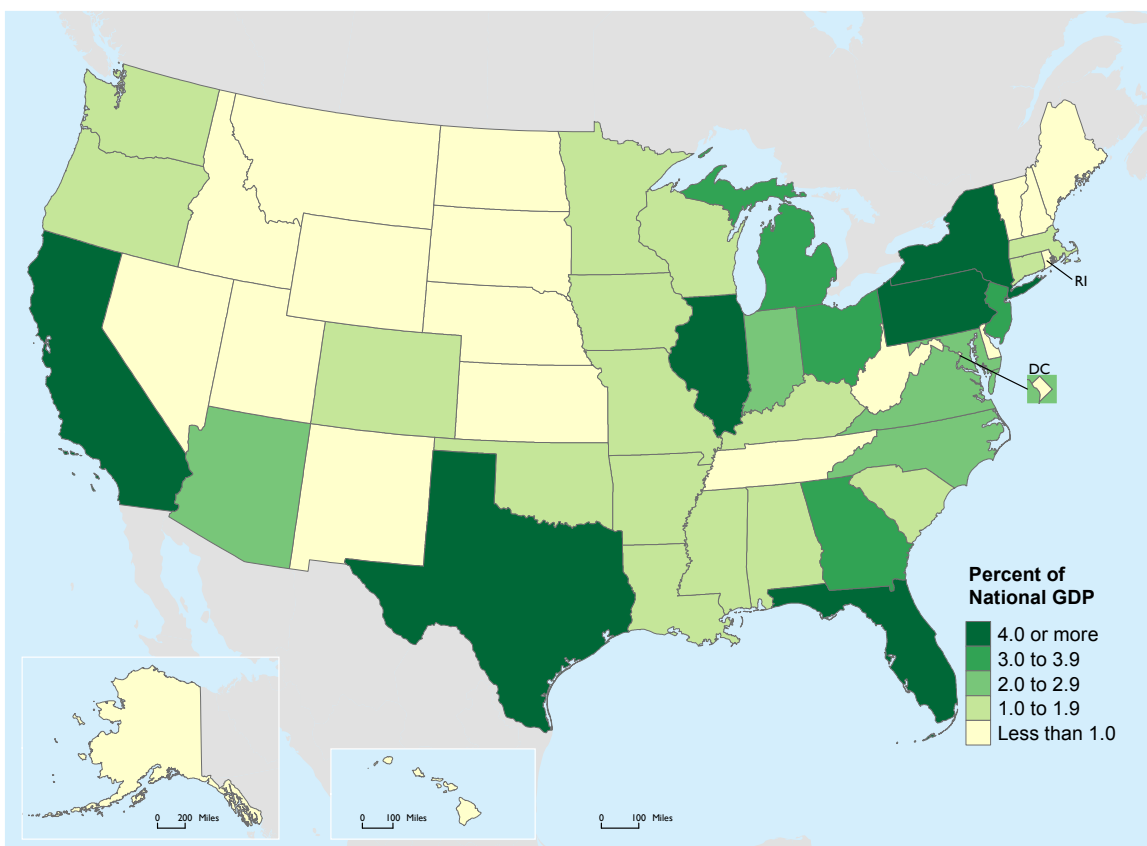
Computing the percent of utilities activity as a percent of a GSP, rather than as a share of GDP, also provides useful insights to U.S. production. Texas, California, New York, Florida, and Illinois were the top five producers of utilities in 2016. Utilities, however, accounted for a small share (2.2 percent or less) of GSP in each of these States in 2016. Utilities accounted for the largest share of

GSP in Mississippi (2.8 percent or \$3.1 billion) (see Appendix A).

The utilities sector was the smallest user of transportation services and used \$18.9 billion of transportation services in 2016 (figure 3-3). The sector relies heavily on pipeline transportation (\$9.1 billion). Specifically, the sector used:

- Primarily pipeline transportation (48.4 percent, or \$9,144 million) (e.g., used to distribute natural gas and move waste through sewer systems) and transportation-related support activities (28.9 percent, or \$5,467 million) (e.g., used to maintain and repair pipelines). Pipeline transportation and transportation-related support activities accounted for 77.3 percent (\$14,611 million) of the total amount of transportation services used by the utilities sector.

Figure 3-2 State Contributions to Utilities Related GDP (percent of national GDP related to utilities), 2016



SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

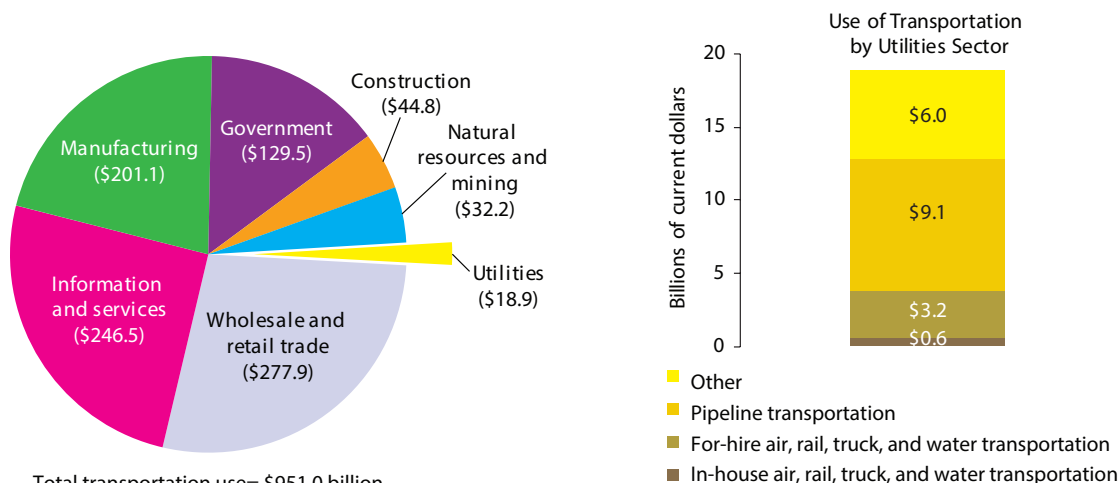
Table 3-2 States Contributing 4.0 Percent or More to National GDP Related to Utilities in 2016

State	Utilities (Utilities related GDP = \$287.1 billion)			All products and services (Total National GDP = \$18.5 trillion)	
	Utilities related GDP (billions)	Percent of national GDP related to utilities	Rank (1=contributes most to national GDP related to utilities, 51=least)	Dollar contribution to national GDP (billions)	Rank (1=contributes most to national GDP, 51=least)
Texas	34.9	12.2	1	1,599.3	2
California	28.8	10.0	2	2,622.7	1
New York	19.0	6.6	3	1,500.1	3
Florida	15.1	5.3	4	926.0	4
Illinois	12.7	4.4	5	796.0	5
Pennsylvania	11.5	4.0	6	719.8	6
Ohio	11.4	4.0	7	626.6	7

NOTE: This table presents the latest available data which do not sum to latest available industry totals as shown in figures 1-1 and 3-1. Data shown in figures 1-1 and 3-1 are based on U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry table, available at <http://bea.gov> as of March 2018.

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

Figure 3-3 Use of Transportation by the Utilities Sector, 2016 (current dollars, billions)



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government passenger transit); Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities. The utilities sector did not use a measureable amount of in-house air, rail, or water transportation in 2016.

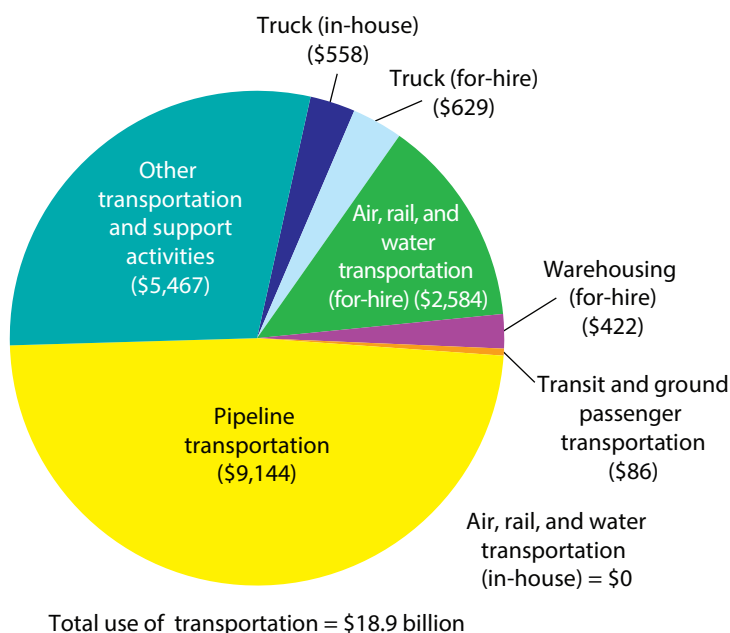
SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

- For-hire truck, air, rail, and water transportation services (used, for instance, to move coal to electric generating plants operating on coal) summing to 17 percent (\$3,213 million) of the total amount of transportation services.
- More for-hire truck transportation operations than in-house truck transportation services. For-hire truck transportation operations comprised 3.3 percent (\$629 million) of the total amount of transportation services used by the sector, while in-house truck transportation accounted for 3.0 percent (\$558 million).
- A small amount of for-hire transit and ground passenger transportation e.g., to provide transportation to workers (0.5 percent, or \$86 million) (figure 3-4).

The utilities sector used the least amount of transportation services in 2016 but ranked as the second most dependent sector on transportation, requiring more transportation services than the average amount needed to produce one dollar of output. In 2016, the utilities sector required 4.9¢ worth of transportation services to produce one dollar of output, while the most dependent sector (wholesale and retail trade) required 9.0¢ worth of transportation services to produce one dollar of output. The utilities sector relied heavily on for-hire transportation services in 2016, requiring 4.7¢ worth of for-hire transportation services (primarily pipeline and transportation-related support activities). The sector required a modest amount of in-house operations (0.1¢)² to produce one dollar of output (figure 3-5).

² In-house and for-hire requirements sum less than overall transportation requirement due to rounding.

Figure 3-4 Utilities Sector's Use of Transportation by Mode, 2016 (current dollars, millions)



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. Transit and passenger ground transportation excludes State and local government passenger transit. Other transportation includes sightseeing transportation. The utilities sector did not use a measureable amount of in-house air, rail, or water transportation in 2016.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

The overall transportation requirement for the utilities sector (4.9¢) is larger than most other inputs. In 2016 transportation services ranked as the second most important input. Natural resources and mining products (e.g., coal, petroleum, etc.) ranked as most important input. The utilities sector required 7.6¢ worth of natural resources and mining products to produce one dollar of output (figure 3-6).

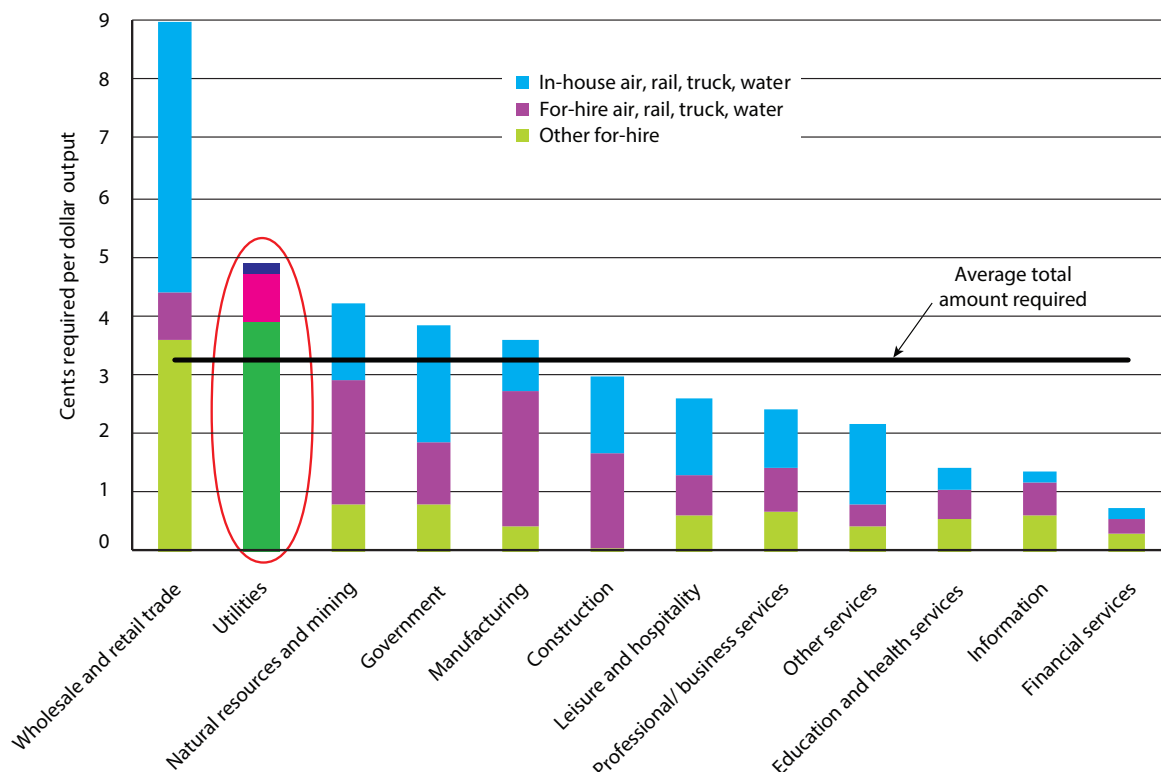
In 2016 the utilities sector employed nearly 9 thousand transportation and material moving workers, accounting for 1.5 percent of its entire work force. The sector employed more material moving workers (5,570) than transportation

workers (2,760)³ (figure 3-7). Transportation workers include motor vehicle operators, ship engineers, aircraft pilots and flight engineers, etc. Material moving workers support transportation activities and include occupations such as cleaners of vehicles and ship loaders.

Transportation and material moving workers in the utilities sector earned a median wage of \$53,220 in 2016, while workers of all occupations in the utilities industry earned a higher median wage of \$72,290 (figure 3-8).

³ Total for transportation occupations includes supervisors of material moving workers, which could not be separated from supervisors of transportation workers.

Figure 3-5 Transportation Required Per Dollar of Output by the Utilities Sector, 2016



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries.

“Other” for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

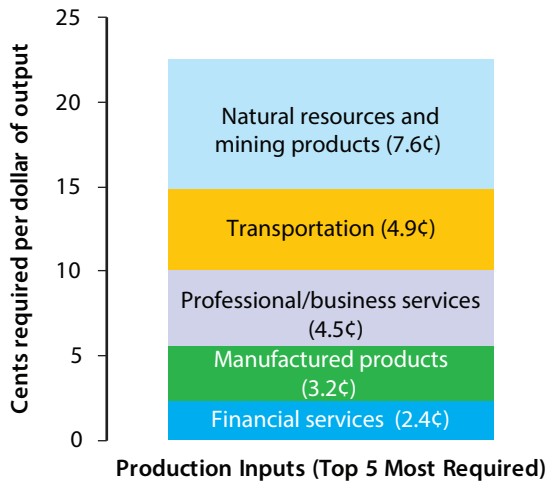
SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

The utilities sector employed the largest number of transportation workers as heavy and tractor-trailer truck drivers (1,460), followed first-line supervisors of transportation and material moving and vehicle operators (340), and by light truck or delivery services drivers (250). Heavy and tractor-trailer truck drivers earned a lower median wage (\$45,690) than light truck or delivery services drivers (\$60,700) and significantly less than first-line supervisors (\$80,280). First-line supervisors earned a higher

median wage than all transportation and material moving workers and a slightly higher median wage than all utilities workers. Heavy and tractor-trailer truck drivers earned less than the sector median wage (figure 3-8).

The 2002 Vehicle Inventory and Use Survey (VIUS) is the most recent survey of vehicle ownership and use by industry. According to the 2002 VIUS, the utilities industry operated, at 0.7 million, fewer trucks than many other industries and accumulated fewer miles (10.2 billion) (figure 3-9).

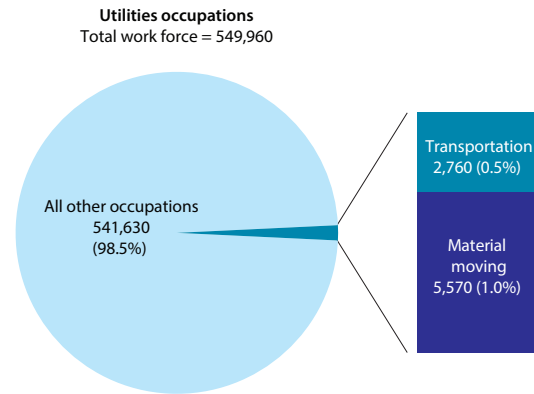
Figure 3-6 Top 5 Most Required Inputs by the Utilities Sector to Produce a Dollar of Output, 2016



NOTE: Transportation includes in-house and for-hire. The utilities sector requires 0.1 cents per dollar of output of in-house transportation and 4.7 cents per dollar of output of for-hire transportation. TSAs data are revised for 2008 to 2016 with latest BEA data. Due to changes in the source data, the numbers in this release are not comparable to those in our previous release.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

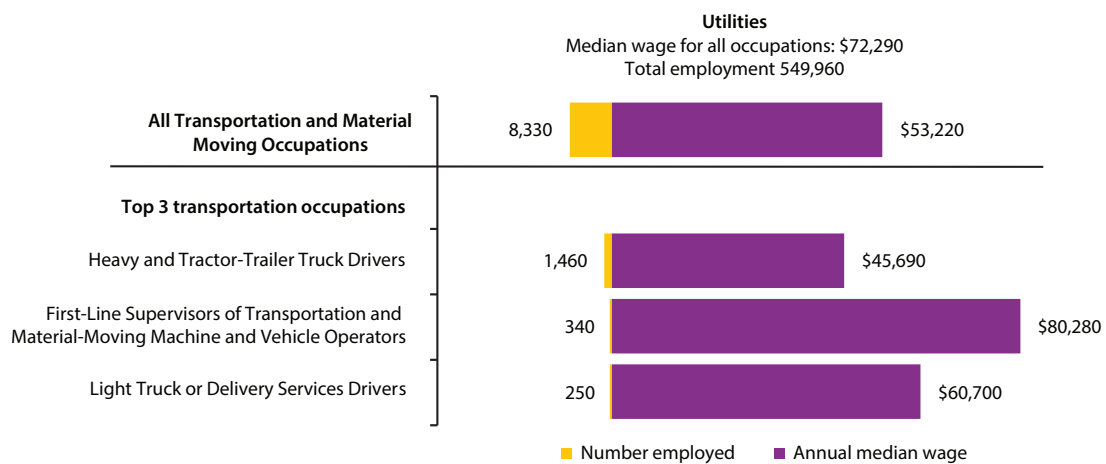
Figure 3-7 Number of Workers Employed in the Utilities Sector by Occupation, 2016



NOTE: Total for transportation occupations includes supervisors of material moving workers, which could not be separated from supervisors of transportation workers.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

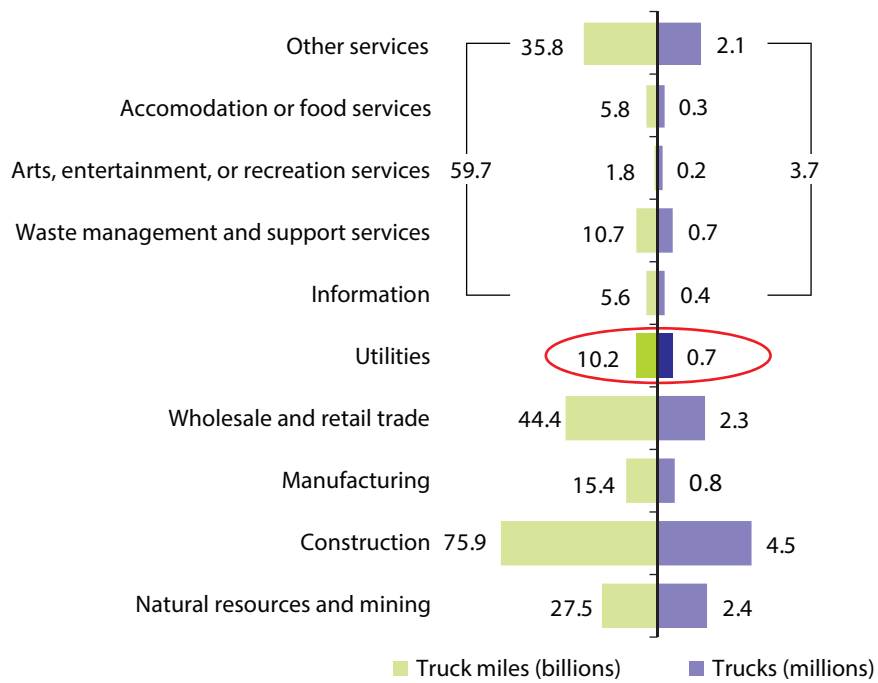
Figure 3-8 Median Annual Wage and Employment for Most Common Transportation Occupations (Top 3) in Utilities Sector, 2016



NOTE: Top three transportation occupations are the transportation occupations employing the largest number of workers and are selected from detailed occupation group in Bureau of Labor Statistics Occupational Employment and Wages table. Material moving occupations not included in the selection of the top three transportation occupations. First-line supervisors of machine and vehicle operators includes first-line supervisors of material moving occupations.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, *Occupational Employment and Wages*, available at <http://www.bls.gov/oes> as of August 30, 2017.

Figure 3-9 Trucks Used and Truck Miles Accumulated for Business by the Utilities Sector, 2002



NOTE: Totals for trucks in use only.

SOURCE: U.S. Census Bureau, 2002 Economic Census Vehicle Inventory and Use Survey, Table 2a, available at <https://www.census.gov/prod/ec02/ec02tv-us.pdf> as of August 2012

CHAPTER 4 CONSTRUCTION



This chapter provides an overview of the contribution of the construction sector to the economy and the use of transportation by the sector. The construction sector consists of establishments engaging in the construction of buildings or engineering projects (e.g., highways and utility systems), the preparation of sites for new construction, or subdivision of land for sale as building sites.¹

The sector uses less transportation services than all other sectors except the utilities and the natural resources and mining sectors in absolute dollars. Additionally, on the basis of transportation required per dollar of output, the construction sector requires slightly less transportation services than most other sectors. The sector relies heavily on truck transportation services, using more dollars of truck transportation services than all other modes combined, and employing more in motor vehicle occupations than any other transportation occupation.

Table 4-1 Overview of the Construction Sector’s Contribution to Gross Domestic Product (GDP) and Use of Transportation

Construction	Value	Year (latest year data is available)
Contribution to GDP	\$792.5 billion	2016
Use of transportation	\$44.8 billion	2016
Amount of transportation required to produce a dollar of output	2.9¢	2016
Number of transportation and material moving workers	218,650	2016
Transportation and material moving workers as percent of sector’s work force	3.3%	2016
Median annual wage of transportation and material moving workers	\$38,560	2016
Number of trucks used	4,542 thousand	2002
Truck miles accumulated	75,906 million	2002

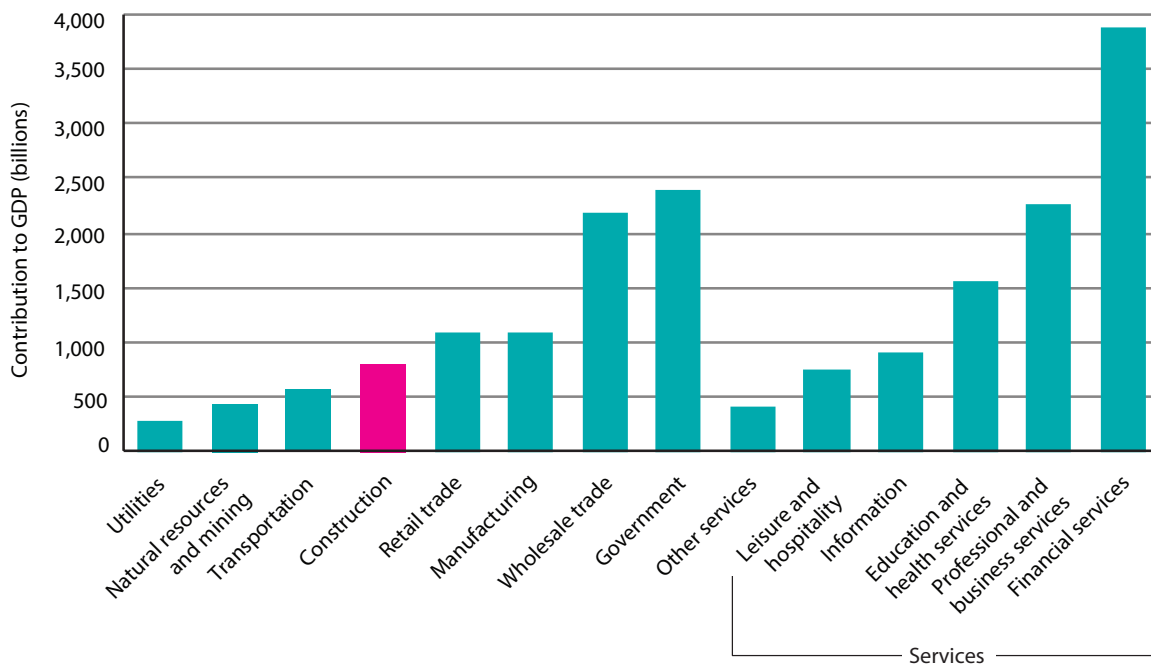
NOTE: Table presents latest data available, as of March 2018.

*Data on number of trucks and truck miles accumulated was last collected in the Vehicle Inventory and Use Survey for 2002.

SOURCE: Data for this table is drawn from figures and tables presented throughout this chapter.

In 2016 the construction sector contributed \$792.5 billion (4.3 percent) to the national economy, as measured by gross domestic product (GDP) (table 4-1, figure 4-1). The construction sector contributed

¹ U.S. Department of Labor, Bureau of Labor Statistics, Industries at a Glance, www.bls.gov/iag/tgs/iag_index_naics.htm, as of March 30, 2018

Figure 4-1 Construction Sector's Contribution to Gross Domestic Product, 2016

NOTE: 2016 GDP = \$18,624 billion

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry, available at <http://bea.gov> as of March 2018.

less to the economy than many sectors but builds the transportation infrastructure needed to move the goods produced by other sectors throughout the economy.

The largest amount of construction activity occurred in California (\$101.7 billion), followed by Texas (\$91.3 billion), New York (\$49.5 billion), Florida (\$48.1 billion), and Pennsylvania (\$31.7 billion)— each of which accounted for 4 percent or more of national activity in the construction sector (figure 4-2, table 4-2).

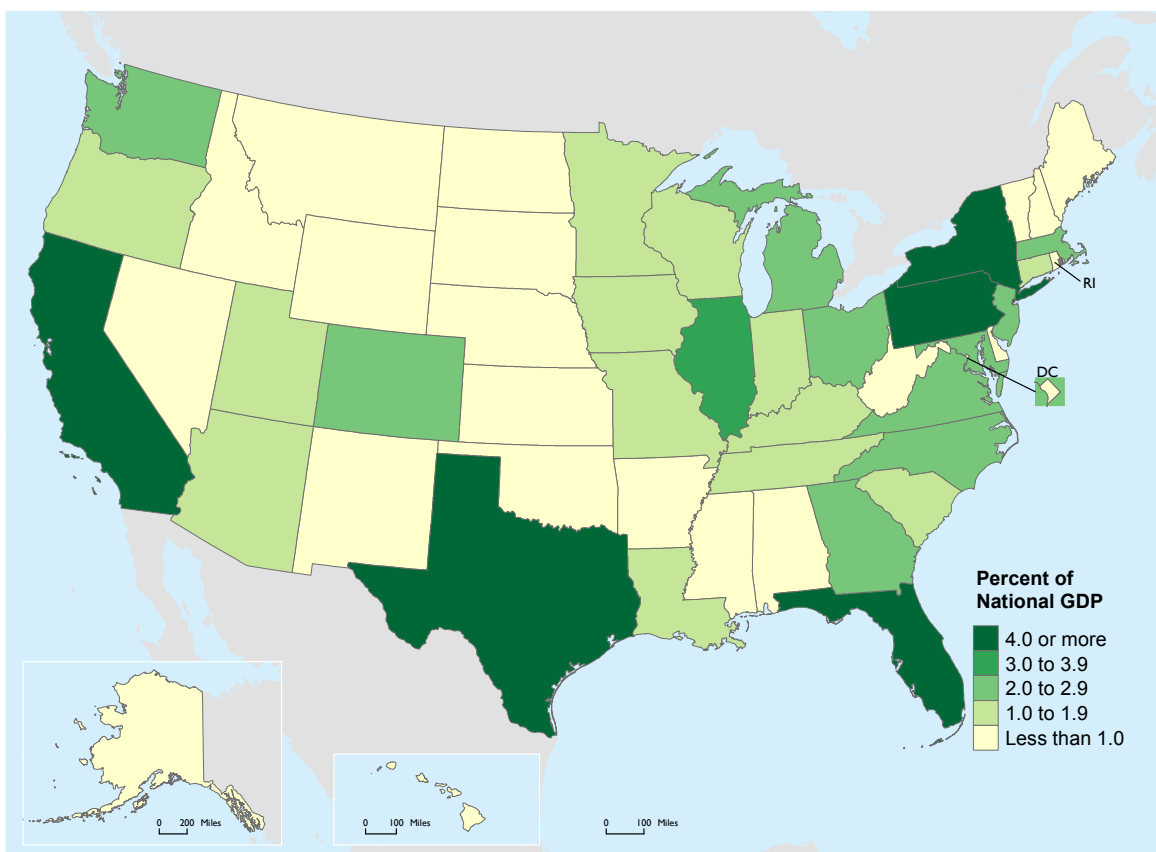
Computing the percent of construction sector activity as a percent of a gross state product (GSP), rather than as a share of GDP, also provides useful insights to U.S. production. Nationally, California, Texas, New York, Florida, and Pennsylvania led

in construction sector activity in 2016. However, construction was not the leading activity in these states and accounted for only a small share (less than 5.7 percent) of GSP. Construction accounted for the largest share of GSP in North Dakota (7.6 percent, or \$4.1 billion). North Dakota, however, contributed less than 4 percent to national GDP related to construction (see Appendix A).

The construction sector was the third smallest user of transportation services in 2016 (\$44.8 billion), using mostly for-hire (\$24.5 billion) and in-house (\$19.6 billion) air, rail, truck, and water transportation services (figure 4-3).

Of the \$44.8 billion of transportation services used in 2016 (figure 4-4), the construction sector specifically used:

Figure 4-2 State Contributions to Construction Related GDP (percent of national GDP related to construction), 2016



SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

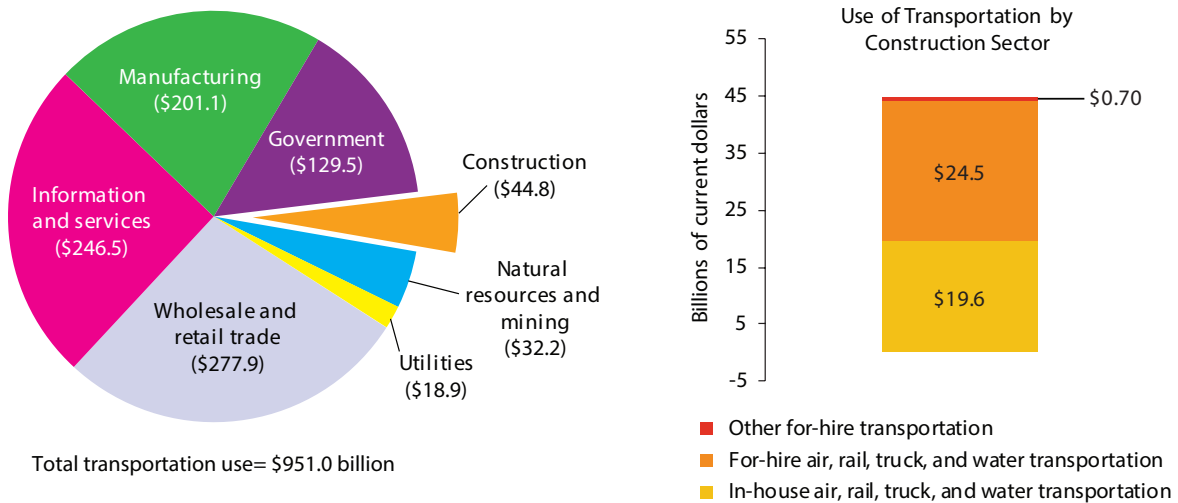
Table 4-2 States Contributing 4.0 Percent or More to National GDP Related to Construction in 2016

State	Construction (Construction related GDP = \$792.5 billion)			All products and services (Total National GDP = \$18.5 trillion)	
	Construction related GDP (billions)	Percent of national GDP related to construction	Rank (1=contributes most to national GDP related to construction, 51=least)	Dollar contribution to national GDP (billions)	Rank (1=contributes most to national GDP, 51=least)
California	101.7	12.8	1	2,622.7	1
Texas	91.3	11.5	2	1,599.3	2
New York	49.5	6.3	3	1,500.1	3
Florida	48.1	6.1	4	926.0	4
Pennsylvania	31.7	4.0	5	719.8	6

NOTE: This table presents the latest available data which do not sum to latest available industry totals as shown in figures 1-1 and 4-1. Data shown in figures 1-1 and 4-1 are based on U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry table, available at <http://bea.gov> as of March 2018.

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

Figure 4-3 Use of Transportation by the Construction Sector, 2016 (current dollars, billions)



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government passenger transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities. The construction sector did not use a measurable amount of for-hire warehousing, or in-house air, rail, and water transportation.

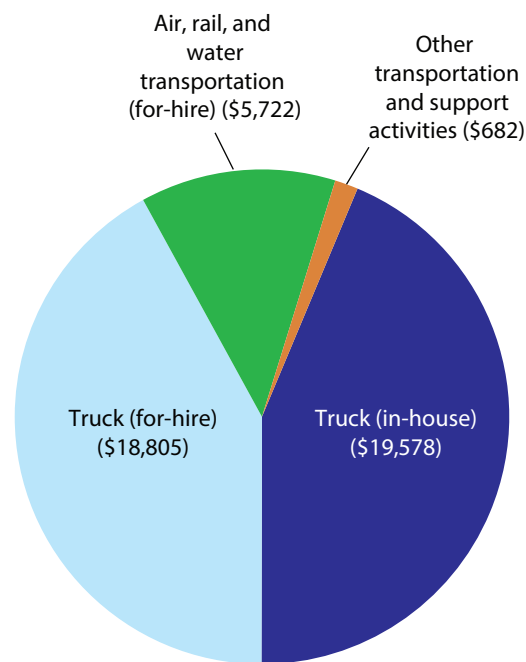
SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

- Almost exclusively truck transportation services (e.g., for hauling materials and equipment to a construction site), which accounted for 85.7 percent (\$38,383 million total) of all transportation services used by the sector.
- Slightly more in-house truck transportation operations (\$19,578 million) than for-hire truck transportation services (\$18,805 million), with in-house truck transportation operations accounting for almost half (43.7 percent) of all transportation services used.
- A modest amount of air, rail, and water transportation services, which collectively accounted for 12.8 percent (\$5,722 million) of all the transportation services used. All of air, rail, and water transportation services used were for-hire.

The construction sector required slightly less transportation services in producing output than the average sector and substantially less transportation services than the sector depending the most on transportation services. In 2016 the construction sector required 2.9¢ worth of transportation services to produce one dollar of output, while the most dependent sector (wholesale and retail trade) required 9.0¢ worth of transportation services to produce one dollar of output (figure 4-5). The construction sector relied less upon in-house transportation operations than for-hire transportation services, requiring 1.3¢ worth of in-house transportation services and 1.6¢ worth of for-hire transportation operations to produce one dollar of output.

The overall transportation requirement for the construction sector (2.9¢) is relatively modest

Figure 4-4 Construction Sector's Use of Transportation by Mode, 2016 (current dollars, millions)



Total use of transportation = \$44.8 billion

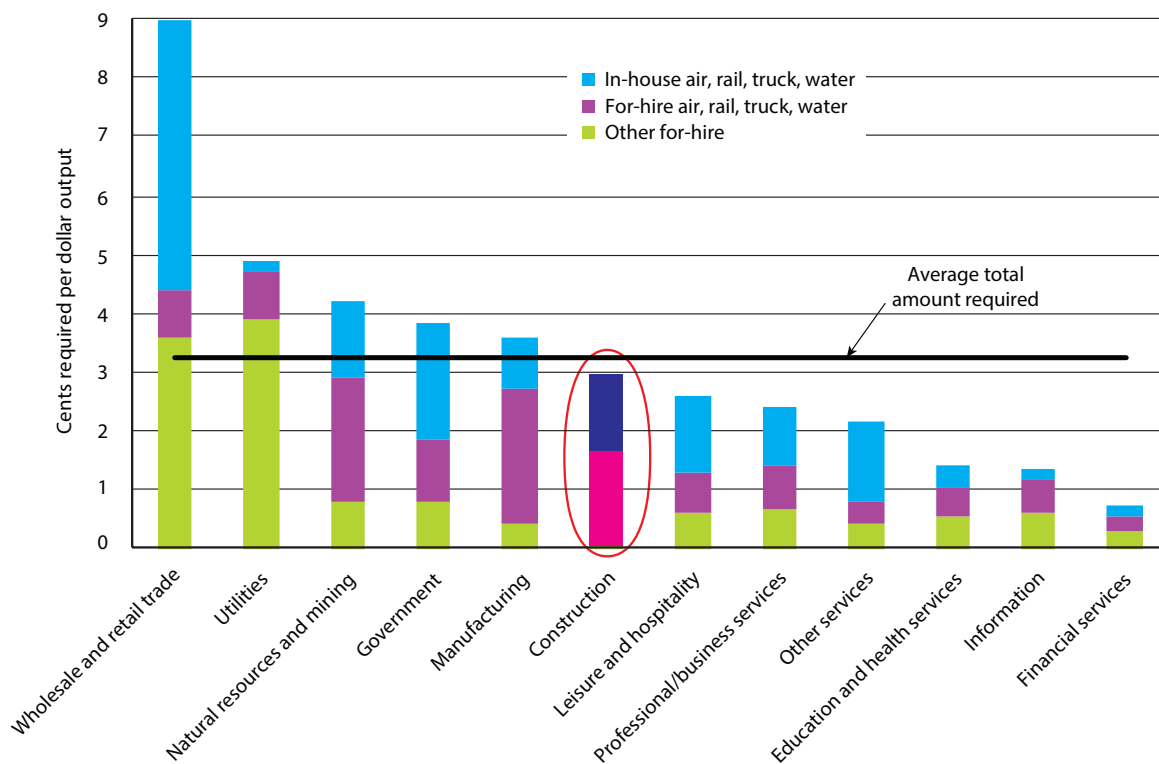
NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries.

"Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); and Other transportation and support activities.

The construction sector did not use a measurable amount of for-hire warehousing, or in-house air, rail, and water transportation.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Figure 4-5 Transportation Required Per Dollar of Output by Construction Sector, 2016



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries.

“Other” for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

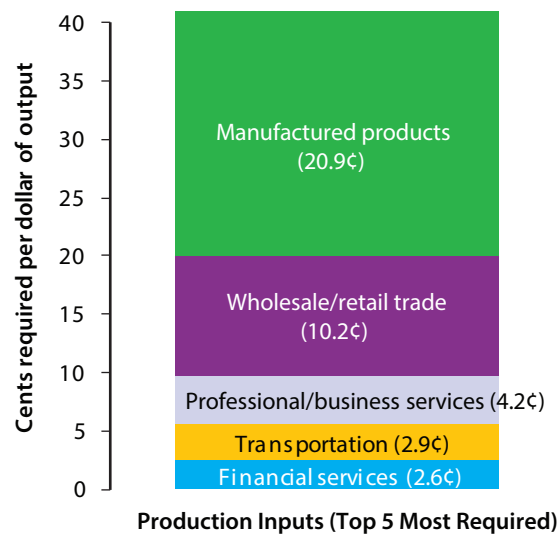
compared to other inputs. In 2016 transportation services were the fourth most important input, while manufactured products (e.g. nails, sheet metal, etc.) were the most important input. The construction sector required 20.9¢ worth of manufactured products to produce one dollar of output (figure 4-6).

In 2016 the construction sector employed 218,650 transportation and material moving workers, accounting for 3.3 percent of its entire work force (figure 4-7). Transportation workers (125,780, or

1.9 percent) include motor vehicle operators, ship engineers, aircraft pilots and flight engineers, etc. Material moving workers (92,870, or 1.4 percent) support transportation activities and include occupations such as cleaners of vehicles and ship loaders.

Transportation and material moving workers in the construction sector earned a median wage of \$38,560 in 2016, while workers of all occupations in the construction sector earned a higher median wage of \$44,630 (figure 4-8).

Figure 4-6 Top 5 Inputs Required by the Construction Sector to Produce a Dollar of Output, 2016

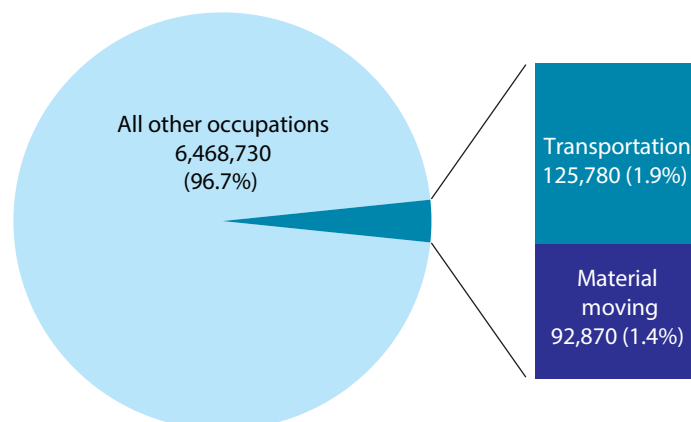


NOTE: Transportation includes in-house and for-hire. The construction sector requires 1.3 cents per dollar of output of in-house transportation and 1.6 cents per dollar of output of for-hire transportation. TSAs data are revised for 2008 to 2016 with latest BEA data. Due to changes in the source data, the numbers in this release are not comparable to those in our previous release.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

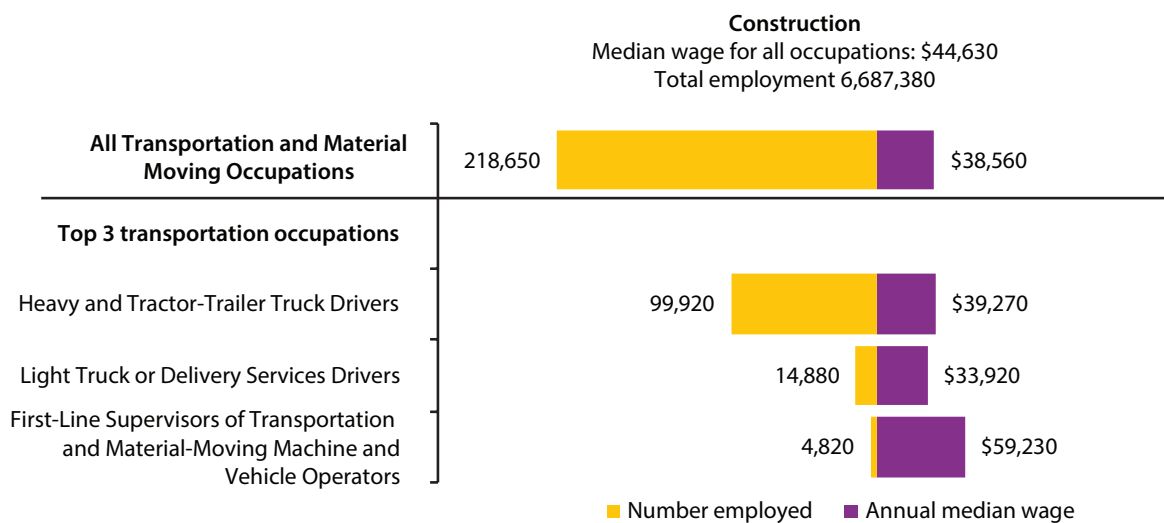
Figure 4-7 Number of Workers Employed in the Construction Sector by Occupation, 2016

Construction occupations
Total work force = 6,687,380



SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

Figure 4-8 Median Annual Wage and Employment for Most Common Transportation Occupations (Top 3) in Construction Sector, 2016



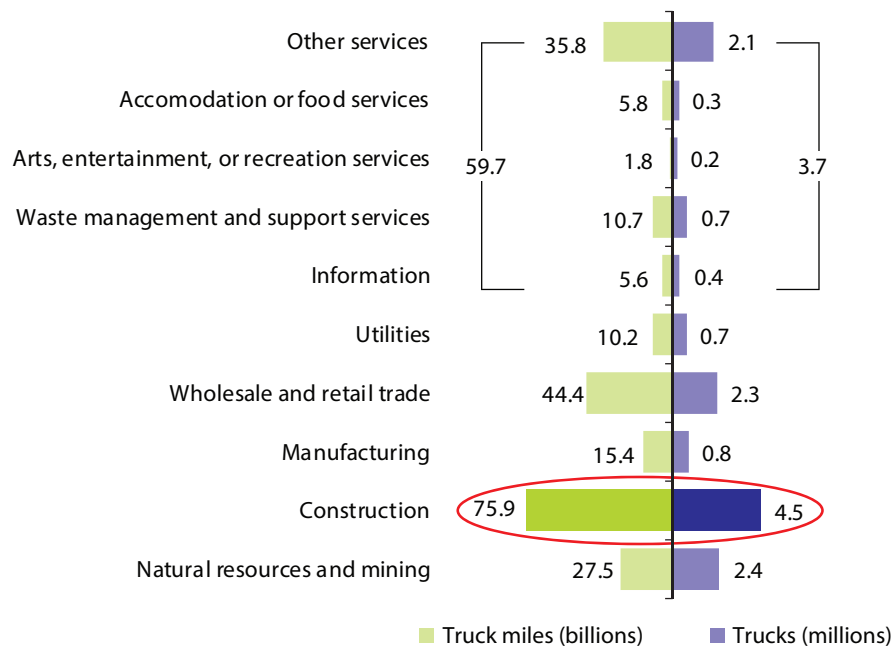
NOTE: Top three transportation occupations are the transportation occupations employing the largest number of workers and are selected from detailed occupation group in Bureau of Labor Statistics Occupational Employment and Wages table. Material moving occupations not included in the selection of the top three transportation occupations. First-line supervisors of machine and vehicle operators includes first-line supervisors of material moving occupations.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, *Occupational Employment and Wages*, available at <http://www.bls.gov/oes> as of August 30, 2017

The construction sector employed the largest number of workers as heavy and tractor-trailer truck drivers (99,920), followed by light truck or delivery services drivers (14,880). Workers in these two occupations collectively accounted for 52.5 percent of the sector’s entire transportation and material moving workforce (114,800 of 218,650). Heavy and tractor-trailer truck drivers earned a slightly higher median wage (\$39,270) than light truck or delivery services drivers (\$33,920).

The 2002 Vehicle Inventory and Use Survey (VIUS) is the most recent survey of vehicle ownership and use by industry. According to the 2002 VIUS, the construction industry operated, at 4.5 million, the largest number of trucks and accumulated the most truck miles at 75.9 billion miles (figure 4-9).

Figure 4-9 Trucks Used and Truck Miles Accumulated for Business by the Construction Industry, 2002



NOTE: Totals for trucks in use only.

SOURCE: U.S. Census Bureau, 2002 Economic Census Vehicle Inventory and Use Survey, Table 2a, available at <https://www.census.gov/prod/ec02/ec02tv-us.pdf> as of August 2012.

CHAPTER 5 MANUFACTURING



This chapter provides an overview of the contribution of the manufacturing sector to the economy and the use of transportation by the sector. The manufacturing sector consists of establishments engaging in the mechanical, physical, or chemical transformation of materials, substance, or components into new products. Establishments performing these activities typically are plants, factories, or mills.¹

In absolute dollars, the sector uses the third largest amount of transportation services. Per dollar of output, the manufacturing sector requires slightly more transportation services than most other sectors. The sector continues to rely heavily on truck transportation services, shipping the most tons and largest value of product by truck, and employing more in motor vehicle occupations than any other transportation occupation. The sector uses more for-hire truck transportation services than in-house truck operations.

Table 5-1 Overview of the Manufacturing Sector's Contribution to Gross Domestic Product (GDP) and Use of Transportation

Manufacturing	Value	Year (latest year data is available)
Contribution to GDP	\$2,183.0 billion	2016
Use of transportation	\$201.1 billion	2016
Amount of transportation required to produce a dollar of output	3.6¢	2016
Number of transportation and material moving workers	969,070	2016
Transportation and material moving workers as percent of sector's work force	7.9%	2016
Median annual wage of transportation and material moving workers	\$31,010	2016
Number of trucks used	783 thousand	2002
Truck miles accumulated	15,385 million	2002
Shipments made by manufacturing industry		
Value	\$5.7 trillion	2012
Tons	4.2 billion	2012
Ton-miles	1.3 trillion	2012
Average miles per shipment	713	2012

NOTE: Table presents latest data available, as of March 2018

*Data on number of trucks and truck miles accumulated was last collected in the Vehicle Inventory and Use Survey for 2002.

SOURCE: Data for this table is drawn from figures and tables presented throughout this chapter.

¹ U.S. Department of Labor, Bureau of Labor Statistics, Industries at a Glance, www.bls.gov/iag/tgs/iag_index_naics.htm, as of March 30, 2018

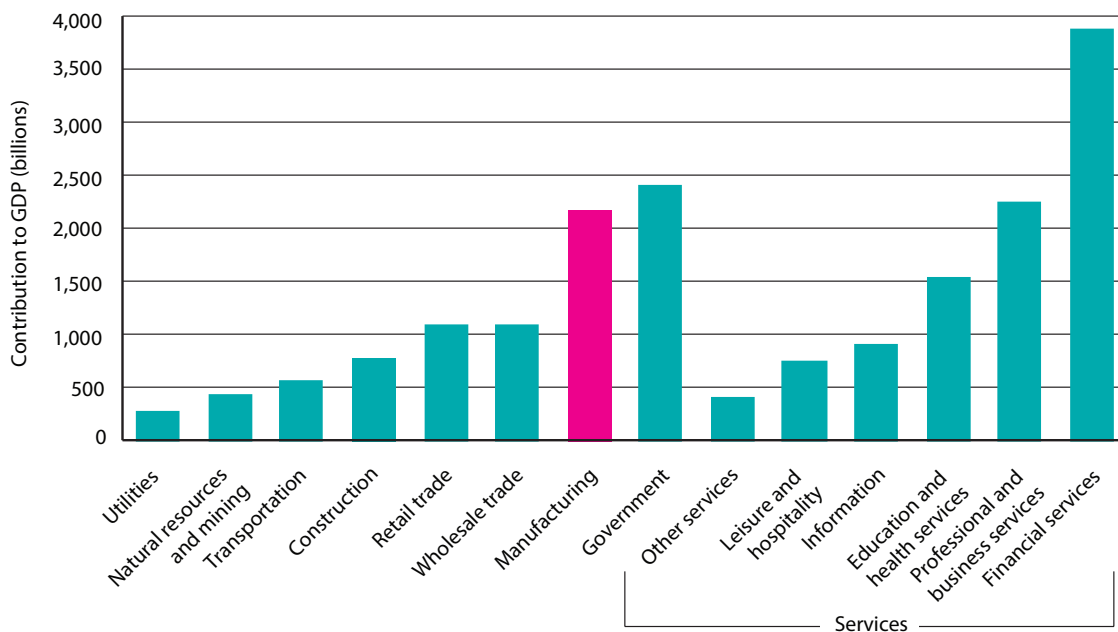
In 2016 the manufacturing sector was the fourth largest contributor to the national economy next to the financial services sector (the largest contributor), the government sector (the second largest contributor), and the professional and business services sector (the third largest contributor). The manufacturing sector contributed \$2,183 billion (11.7 percent) to the national economy, as measured by gross domestic product (GDP) (figure 5-1). The manufacturing sector contributes to the economy by combining raw materials (many produced by other sectors) to make finished products. For example, the manufacturing sector makes bread from the wheat that the natural resources and mining sector produces.

The upper mid-west (Illinois, Ohio, Indiana, and Michigan), known for manufacturing, contributed

significantly to national manufacturing activity in 2016. The largest amount of manufacturing activity, however, occurred in California (\$291.6 billion), followed by Texas (\$218.3 billion), Ohio (\$105.9 billion), North Carolina (\$103.4 billion), Illinois (\$99.9 billion), Indiana (\$99.8 billion), and Michigan (\$92.9 billion) – each of which accounted for four percent or more of national activity in the manufacturing sector (figure 5-2, table 5-2).

Computing the percent of manufacturing sector activity as a percent of a gross state product (GSP), rather than as a share of GDP, also provides useful insights to U.S. production. Nationally, California, Texas, and Ohio produced the most manufactured products in 2016. However, manufacturing activity accounted for only a modest share of economic activity (17.0 percent or less), as measured by GSP, within California,

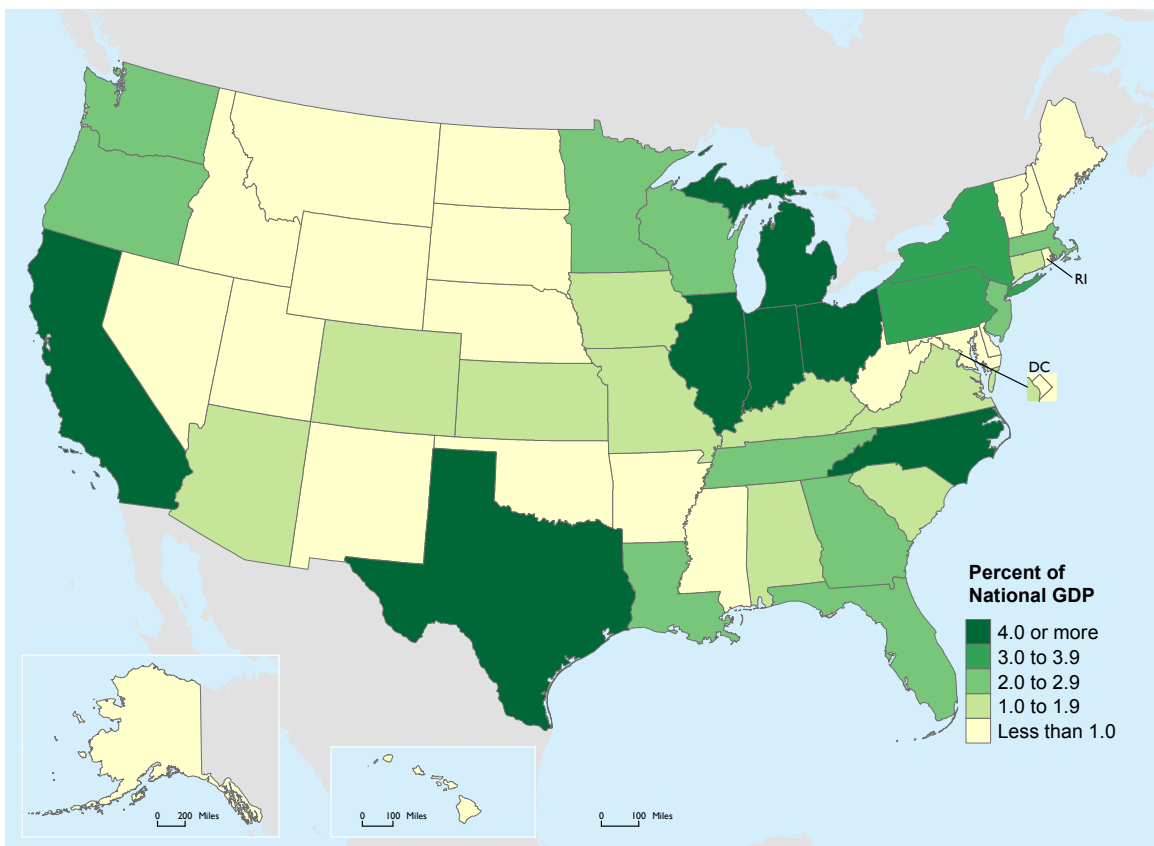
Figure 5-1 Manufacturing Sector’s Contribution to Gross Domestic Product, 2016



NOTE: 2016 GDP = \$18,624 billion

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry, available at <http://bea.gov> as of March 2018.

Figure 5-2 State Contributions to Manufacturing Related GDP (percent of national GDP related to manufacturing), 2016



SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

Table 5-2 States Contributing 4.0 Percent or More to National GDP Related to Manufacturing in 2016

State	Manufacturing (Manufacturing related GDP = \$2,183.0 billion)			All products and services (Total National GDP = \$18.5 trillion)	
	Manufacturing related GDP (billions)	Percent of national GDP related to manufacturing	Rank (1=contributes most to national GDP related to manufacturing, 51=least)	Dollar contribution to national GDP (billions)	Rank (1=contributes most to national GDP, 51=least)
California	291.6	13.4	1	2,622.7	1
Texas	218.3	10.0	2	1,599.3	2
Ohio	105.9	4.9	3	626.6	7
North Carolina	103.4	4.7	4	521.6	10
Illinois	99.9	4.6	5	796.0	5
Indiana	99.8	4.6	6	347.2	16
Michigan	92.9	4.3	7	490.2	13

NOTE: This table presents the latest available data which do not sum to latest available industry totals as shown in figures 1-1 and 5-1. Data shown in figures 1-1 and 5-1 are based on U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry table, available at <http://bea.gov> as of March 2018.

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

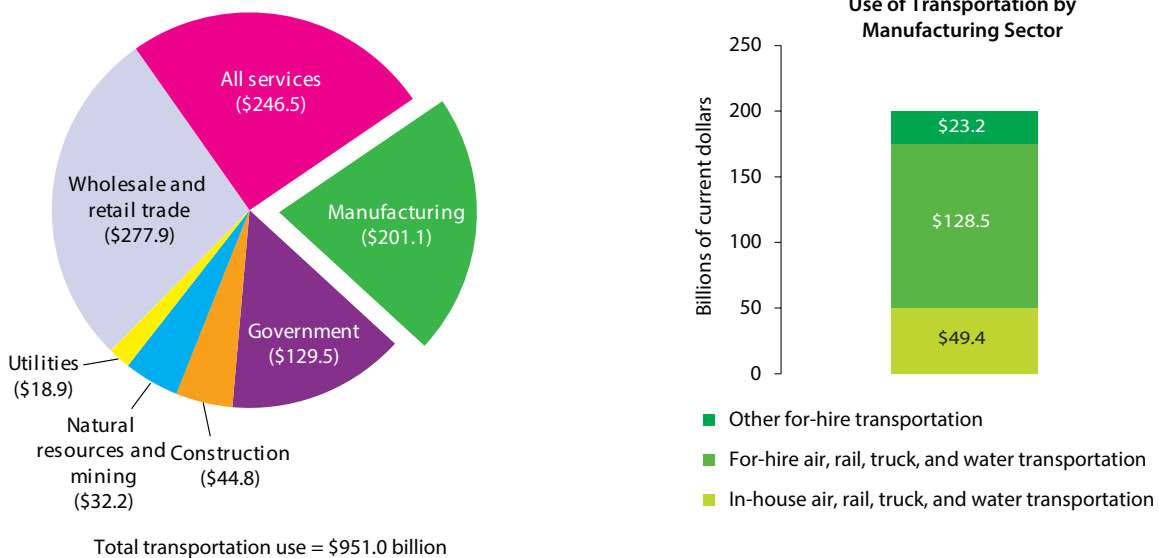
Texas, and Ohio. In contrast, manufacturing accounted for a relatively large share (20 percent or more) of GSP in Indiana (28.7 percent), Oregon (21.7 percent), and Louisiana (20.7 percent). (see Appendix A)

The manufacturing sector was the third largest user of transportation services in 2016 (\$201.1 billion). The manufacturing sector relies heavily on for-hire transportation services – using more for-hire air, rail, truck, and water transportation services (\$128.5 billion) than in-house transportation operations (\$49.4 billion) (figure 5-3).

Of the \$201.1 billion of transportation services (figure 5-4), the manufacturing sector used:

- Primarily for-hire (\$81,237 million) and in-house (\$48,772 million) truck transportation services (e.g., used to haul raw materials like wood and cotton to manufacturing plants), which accounted for almost 60 percent (\$130,009 million total) of all transportation services used by the sector.
- Air, rail, and water transportation services (e.g., for hauling coal to steel forgeries) summing to 23.8 percent (\$47,884 million) of all the transportation services used by the sector. Nearly all air, rail, and water transportation services used were for-hire (\$47,257 of \$47,884 million).
- Other transportation (pipeline transportation, passenger and ground transportation, and

Figure 5-3 Use of Transportation by the Manufacturing Sector, 2016 (current dollars, billions)



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government passenger transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

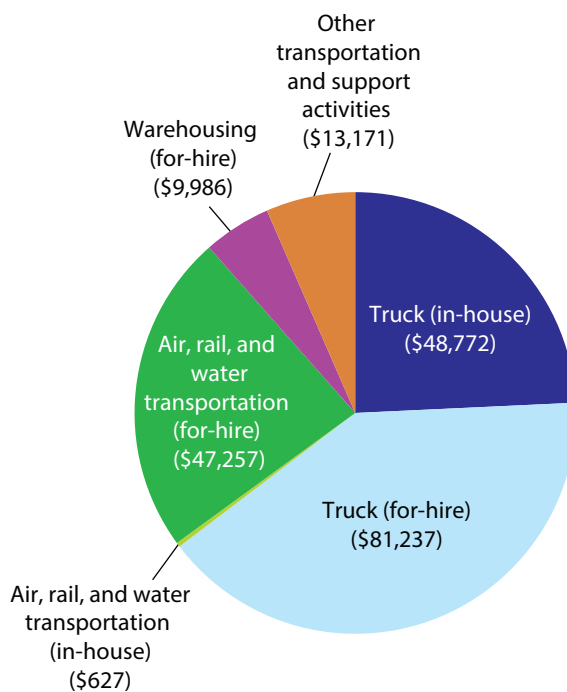
SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

transportation support activities such as freight loading) totaling 6.6 percent (\$13,171 million) of all transportation services used by the sector.

The manufacturing sector required marginally more transportation services in producing output than the average sector, albeit substantially less transportation services than the sector depending the most on transportation. In 2016 the manufacturing sector required 3.6¢ worth

of transportation services to produce one dollar of output, while the most dependent sector (wholesale and retail trade) required 9.0¢ worth of transportation services to produce one dollar of output. The manufacturing sector relied more on for-hire transportation services than in-house transportation operations, requiring 2.7¢ worth of for-hire transportation services to produce one dollar of output and 0.9¢ worth of in-house transportation operations to produce one dollar of output (figure 5-5).

Figure 5-4 Manufacturing Sector’s Use of Transportation by Mode, 2016 (current dollars, millions)

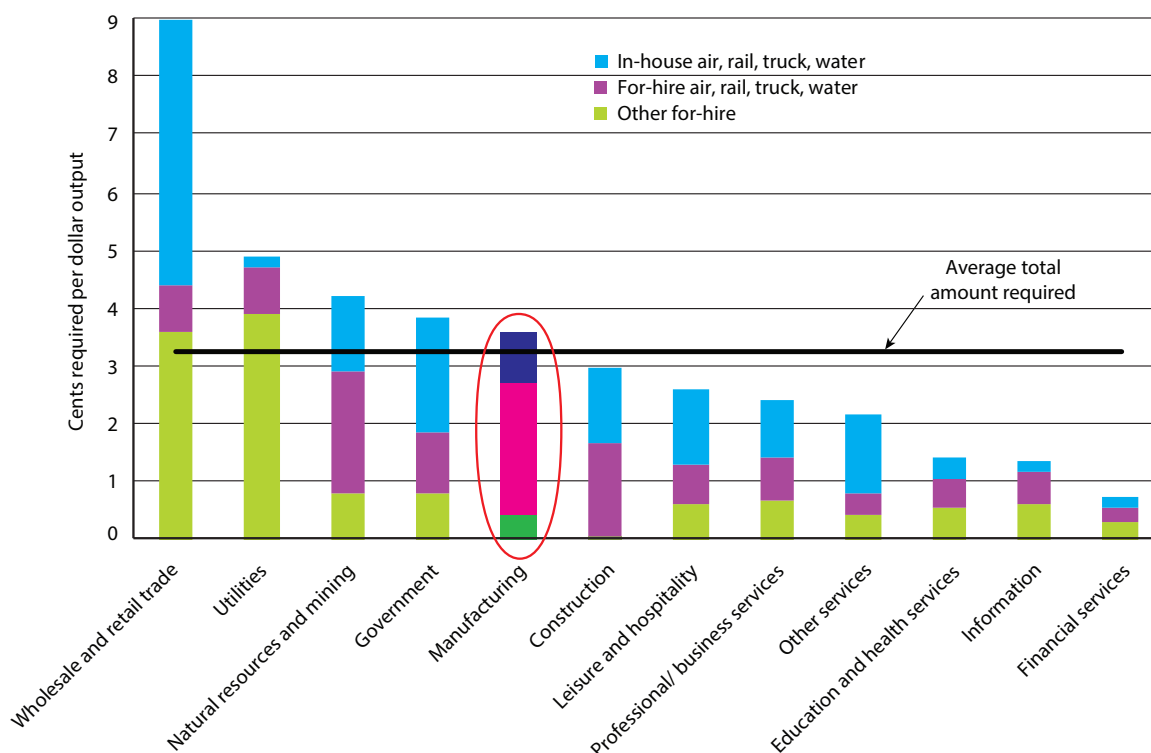


Total use of transportation = \$201.1 billion

NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); and Other transportation and support activities.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Figure 5-5 Transportation Required Per Dollar of Output by the Manufacturing Sector, 2016



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

The overall transportation requirement for the manufacturing sector (3.6¢) is relatively modest compared to other inputs. In 2016 transportation services were the fifth most important input, while manufactured products (e.g., nails, screws, etc.) were the most important input. The manufacturing sector required 33.1¢ worth of manufactured products to produce one dollar of output (figure 5-6).

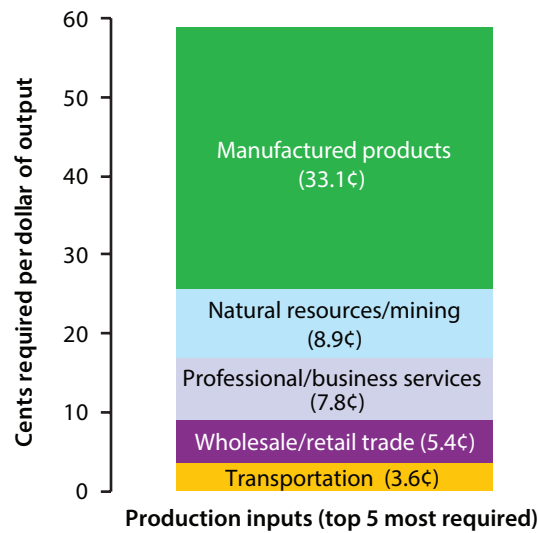
In 2016 the manufacturing sector employed nearly one million transportation and material moving workers, accounting for 7.9 percent

of its entire work force. The sector employed more material moving workers (725,300) than transportation workers (about 243,770)² (figure 5-7). Transportation workers include motor vehicle operators, ship engineers, aircraft pilots and flight engineers, etc. Material moving workers support transportation activities and include occupations such as cleaners of vehicles and ship loaders.

Transportation and material moving workers in the manufacturing sector earned a median

² Total for transportation occupations includes supervisors of material moving workers, which could not be separated from supervisors of transportation workers.

Figure 5-6 Top 5 Most Required Inputs by Manufacturing Sector to Produce a Dollar of Output, 2016

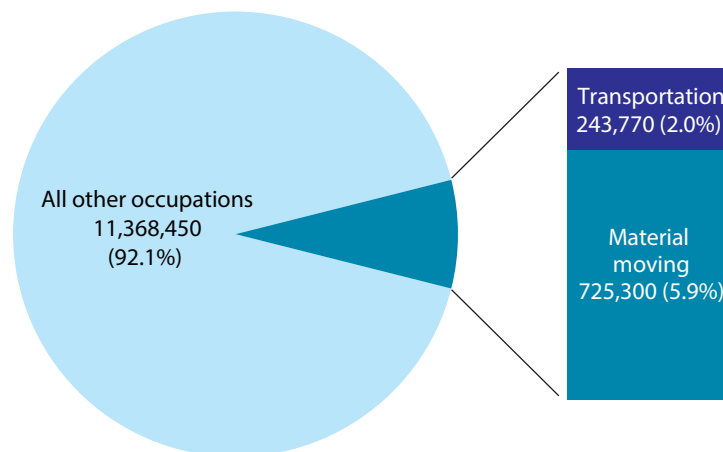


NOTE: Transportation includes in-house and for-hire transportation. The manufacturing sector requires 0.9 cents per dollar of output of in-house transportation and 2.7 cents per dollar of output of for-hire transportation.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Figure 5-7 Number of Workers Employed in the Manufacturing Sector, 2016

Manufacturing occupations
Total work force = 12,337,520



NOTE: Total for transportation occupations includes supervisors of material moving workers, which could not be separated from supervisors of transportation workers.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

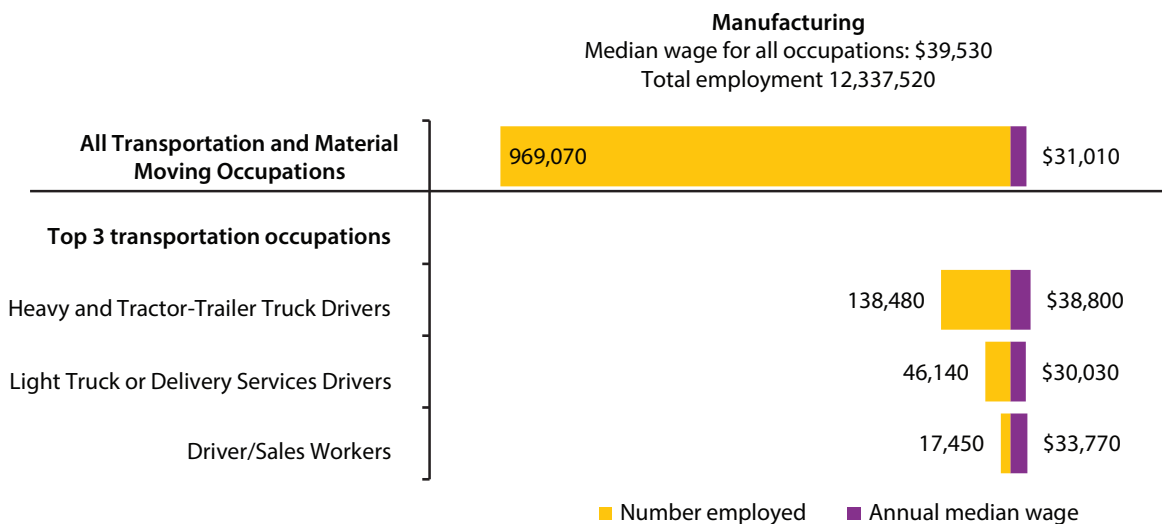
wage of \$31,010 in 2016, while workers of all occupations in the manufacturing sector earned a higher median wage of \$39,530 (figure 5-8).

The manufacturing sector employed the largest number of transportation workers as heavy and tractor-trailer truck drivers (138,480), followed by light truck or delivery services drivers (46,140), and driver/sales workers (17,450). Heavy and tractor-trailer truck drivers earned the highest median wage (\$38,800) among these three types of motor vehicle operators but earned slightly less than the

sector median wage. Driver/sales workers earned a median wage of \$33,770, while light truck or delivery services drivers earned a lower median wage of \$30,030 (figure 5-8).

The 2002 Vehicle Inventory and Use Survey (VIUS) is the most recent survey of vehicle ownership and use by industry. According to the 2002 VIUS, the manufacturing industry operated, at 0.8 million, fewer trucks than most other industries and accumulated fewer miles (15.4 billion) (figure 5-9).

Figure 5-8 Median Annual Wage and Employment for Most Common Transportation Occupations (Top 3) in Manufacturing Sector, 2016



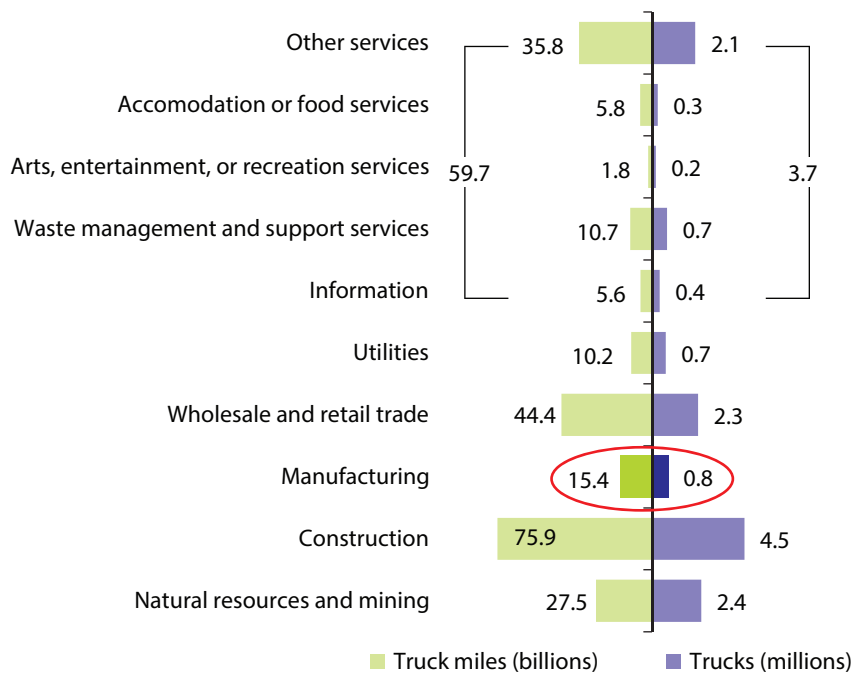
NOTE: Top three transportation occupations are the transportation occupations employing the largest number of workers and are selected from detailed occupation group in Bureau of Labor Statistics Occupational Employment and Wages table. Material moving occupations not included in the selection of the top three transportation occupations.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

The 2012 Commodity Flow Survey shows that the manufacturing industry shipped 4.2 billion tons of raw materials and finished goods domestically, valued at \$5.7 trillion, and accounting for 1.3 trillion ton-miles. Trucking was the dominant mode. Trucks carried 67.5 percent of the tonnage shipped by the manufacturing industry, 66.9

percent of the value, and accounted for 54.2 percent of ton-miles. The manufacturing industry, however, tended to use modes other than truck to ship goods long distances. The average shipment distance was shorter by truck (399 miles per shipment) than by all other modes, and longest by air (1,276 miles per shipment) (figure 5-10).

Figure 5-9 Trucks Used and Truck Miles Accumulated for Business by the Manufacturing Industry, 2002

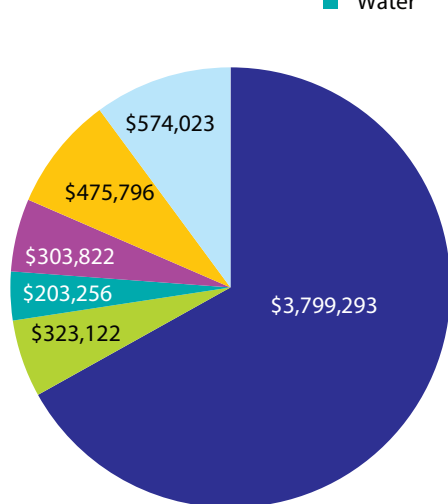


NOTE: Totals for trucks in use only.

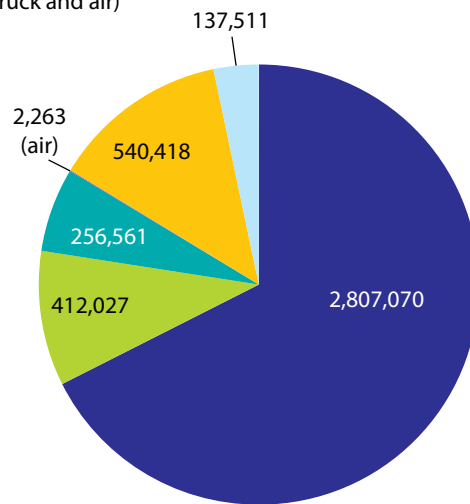
SOURCE: U.S. Census Bureau, 2002 Economic Census Vehicle Inventory and Use Survey, Table 2a, available at <https://www.census.gov/prod/ec02/ec02tv-us.pdf> as of August 2012.

Figure 5-10 Characteristics for Shipments Made by the Manufacturing Sector by Mode of Transportation, 2012

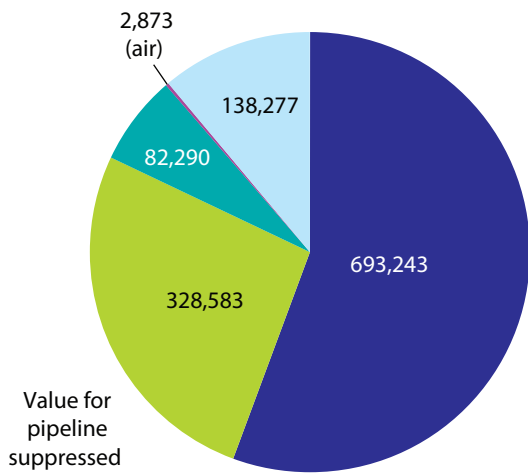
- Truck
- Pipeline
- Rail
- Multiple modes
- Water
- Air (incl truck and air)



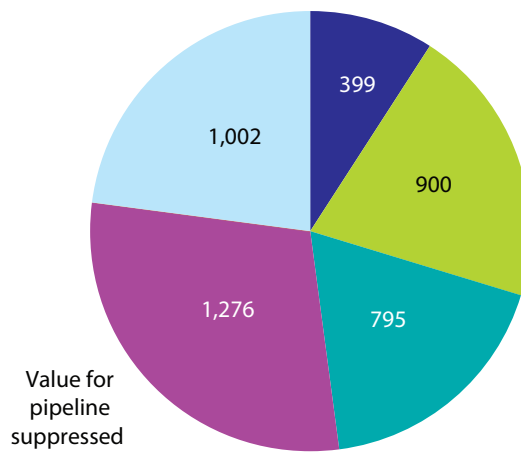
Value of shipments (millions of dollars)
total value of shipments = \$5.7 trillion



Tons (thousands)
total tons shipped = 4.2 billion



Ton-miles (millions)
total ton-miles = 1.3 trillion



Average miles per shipment
average miles per shipment = 713

NOTE: Value for modes may not sum to total due to rounding and data suppression.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Commodity Flow Survey 2012, available at www.bts.gov as of October 2015

CHAPTER 6 WHOLESALE AND RETAIL TRADE



This chapter provides an overview of the contribution of the wholesale and retail trade sector to the economy and the use of transportation services by the sector.

Wholesale trade consists of establishments who sell merchandise to other businesses. They arrange the purchase or sale of goods for resale (i.e., goods sold to other wholesalers or retailers), capital or durable nonconsumer goods, and raw and intermediate materials and supplies

used in production. Establishments performing these activities may be sales branches maintained by manufacturing, refining, or mining enterprises apart from their plants or mines for the purpose of selling their products. They also may be agents or brokers who arrange for the purchase or sale of goods owned by others, often on a commission basis.

Table 6-1 Overview of the Wholesale and Retail Trade Sector's Contribution to Gross Domestic Product (GDP) and Use of Transportation

Wholesale and retail trade	Value	Year (latest year where data available)
Contribution to GDP	\$2,199.5 billion	2016
Use of transportation	\$277.9 billion	2016
Amount of transportation required to produce a dollar of output	9¢	2016
Number of transportation and material moving workers		
Wholesale trade	1,164,310	2016
Retail trade	1,052,440	2016
Transportation and material moving workers as percent of sector's work force		
Wholesale trade	19.9%	2016
Retail trade	6.6%	2016
Median annual wage of transportation and material moving workers		
Wholesale trade	\$31,590	2016
Retail trade	\$23,650	2016
Number of trucks used	2,266 thousand	2002
Truck miles accumulated	44,434 million	2002
Shipments made by wholesale industry		
Value	\$6.1 trillion	2012
Tons	3.8 billion	2012
Ton-miles	723.2 billion	2012
Average miles per shipment	413	2012

NOTE: Table presents latest data available, as of March 2018

*Data on number of trucks and truck miles accumulated was last collected in the Vehicle Inventory and Use Survey for 2002.

Shipment data not available for the retail trade industry.

SOURCE: Data for this table is drawn from figures and tables presented throughout this chapter.

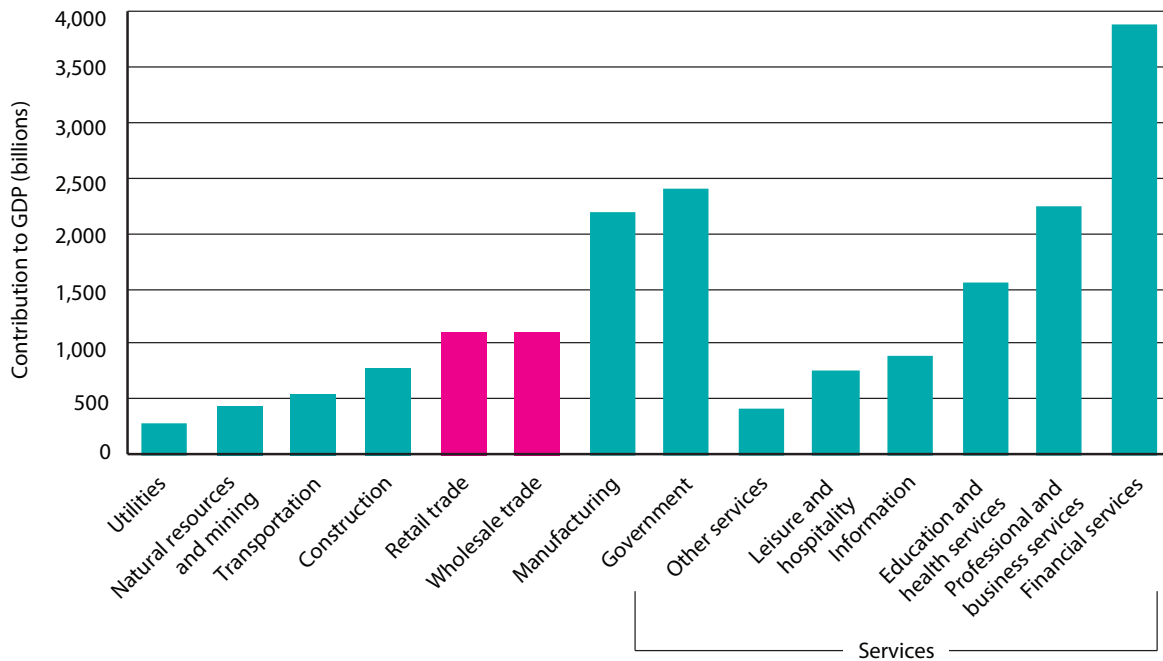
Establishments within the retail trade sector also sell merchandise, but unlike wholesalers, retailers sell merchandise (in small quantities) to the general public for personal or household consumption. In some cases, retailers sell merchandise to businesses and institutions. Retailers may operate stores designed to attract a large number of walk-in customers. This includes establishments like office supply stores, grocery stores, automotive dealers, and gasoline stations. Other retailers, like home heating oil dealers and home newspaper delivery dealers, sell directly to the public but do not sell their merchandise from a storefront.¹

¹ U.S. Department of Labor, Bureau of Labor Statistics, Industries at a Glance, www.bls.gov/iag/tgs/iag_index_naics.htm, as of March 30, 2018

The wholesale and retail trade sector uses more dollars of transportation services and requires more transportation services per dollar of output than any other sector. The sector relies heavily on truck transportation services, with the wholesale trade industry shipping the most tons and largest value of product by truck, and employs a large number of heavy and tractor-trailer truck drivers and light truck/delivery service drivers.

In 2016 the wholesale and retail trade sector combined contributed \$2,199.5 billion (11.8 percent) to the national economy, as measured by gross domestic product (GDP). The wholesale trade sector contributed \$1,102.6 billion (5.9 percent), while the retail trade sector contributed \$1,096.9 billion (5.9 percent) (figure 6-1).

Figure 6-1 Wholesale and Retail Trade Sector's Contribution to Gross Domestic Product, 2016



NOTE: 2016 GDP = \$18,624 billion

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry, available at <http://bea.gov> as of March 2018.

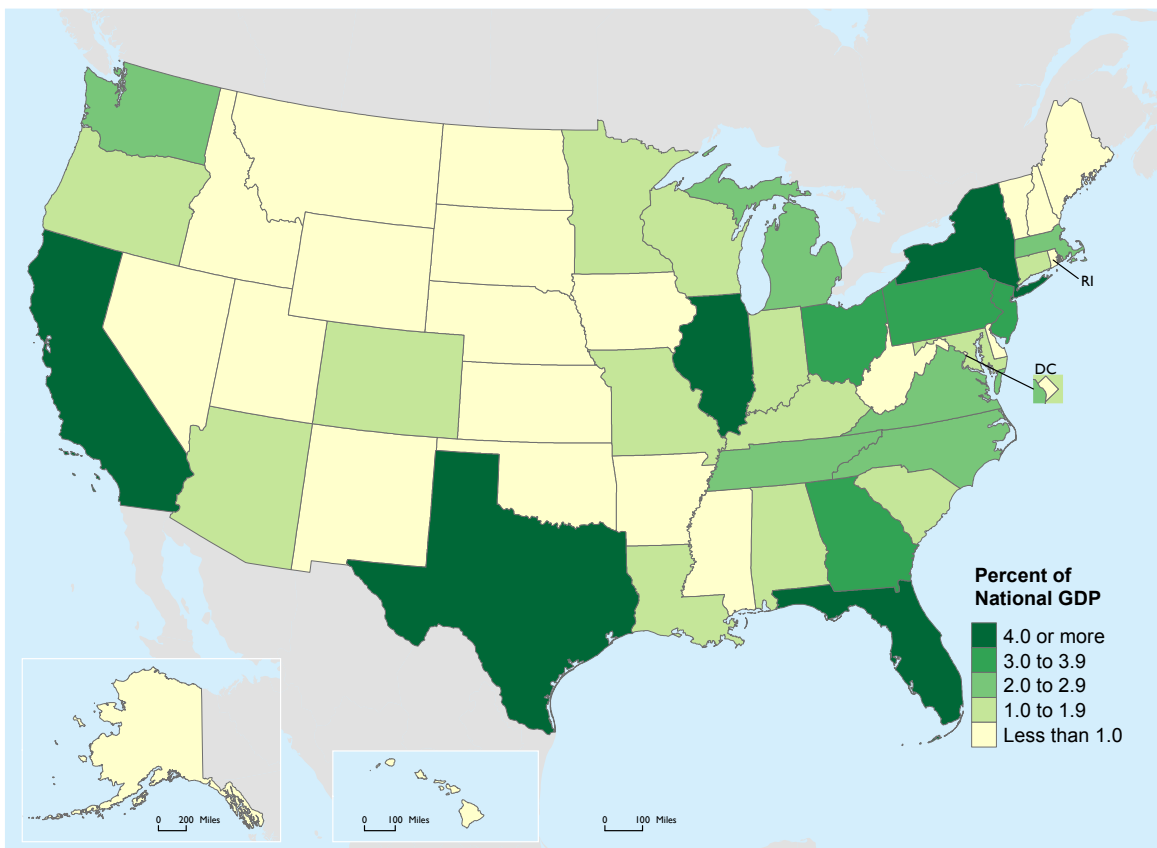
The largest amount of wholesale and retail trade activity combined occurred in California (\$289 billion), followed by Texas (\$223.7 billion), New York (\$143.3 billion), Florida (\$132.5 billion), and Illinois (\$101.3 billion) (figure 6-2). These five States produce more of all goods and services than other States and contributed the most to national GDP in 2016 (figure 6-2, table 6-2).

Computing the percent of wholesale and retail trade as a percent of gross state product (GSP), rather than as a share of GDP, also provides useful insights to U.S. production. Nationally, California led in wholesale and retail trade. However,

wholesale and retail trade accounted for a smaller share of GSP in California (11 percent) than in South Dakota (14.9 percent)– the State where wholesale and retail trade accounted for the largest percent of GSP in 2016 (see Appendix A).

The wholesale and retail sector was the largest user of transportation services in 2016 (\$277.9 billion), and relies heavily on in-house transportation operations. Looking at the use of air, rail, truck, and water transportation services, the sector used significantly more in-house transportation operations (\$142.0 billion) than for-hire services (\$25.8 billion) (figure 6-3).

Figure 6-2 State Contributions to Wholesale and Retail Trade Related GDP (percent of national GDP related to wholesale and retail trade), 2016



SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

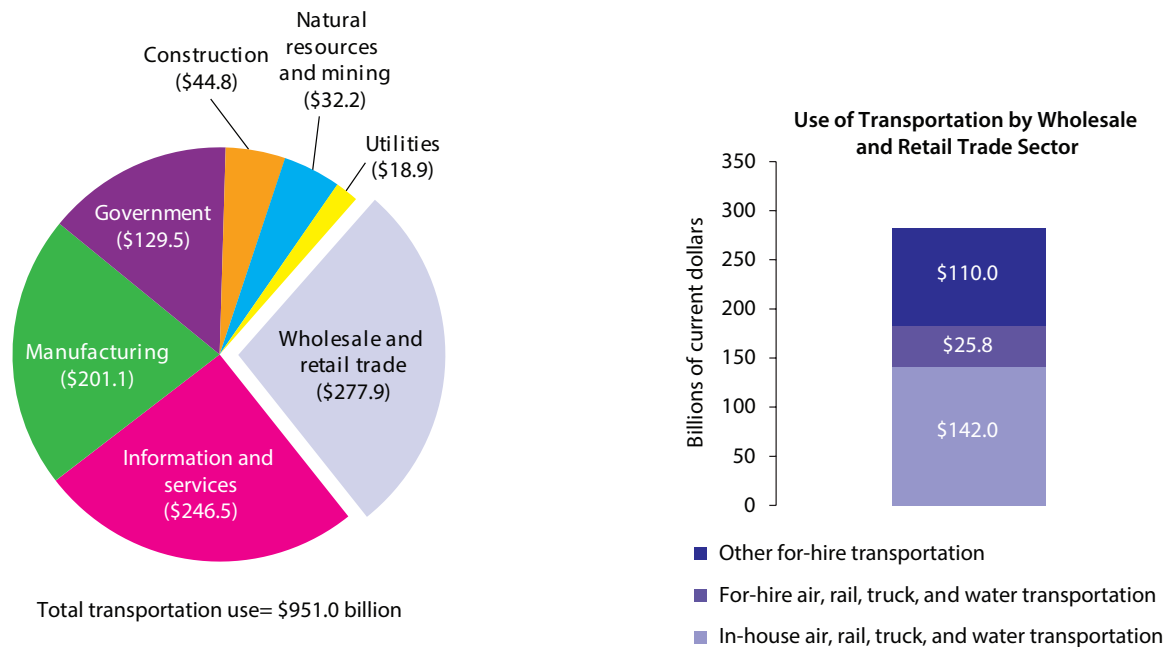
Table 6-2 States Contributing 4.0 Percent or More to National GDP Related to Wholesale and Retail Trade in 2016

State	Wholesale and retail trade (Wholesale and retail trade related GDP = \$2,199.5 billion)			All products and services (Total National GDP = \$18.5 trillion)	
	Wholesale and retail trade related GDP (billions)	Percent of national GDP related to wholesale and retail trade	Rank (1=contributes most to national GDP related to wholesale and retail trade, 51=least)	Dollar contribution to national GDP (billions)	Rank (1=contributes most to national GDP, 51=least)
California	289.0	13.1	1	2,622.7	1
Texas	223.7	10.2	2	1,599.3	2
New York	143.3	6.5	3	1,500.1	3
Florida	132.5	6.0	4	926.0	4
Illinois	101.3	4.6	5	796.0	5

NOTE: This table presents the latest available data which do not sum to latest available industry totals as shown in figures 1-1 and 6-1. Data shown in figures 1-1 and 6-1 are based on U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry table, available at <http://bea.gov> as of March 2018.

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

Figure 6-3 Use of Transportation by the Wholesale and Retail Trade Sector, 2016 (current dollars, billions)



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government passenger transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

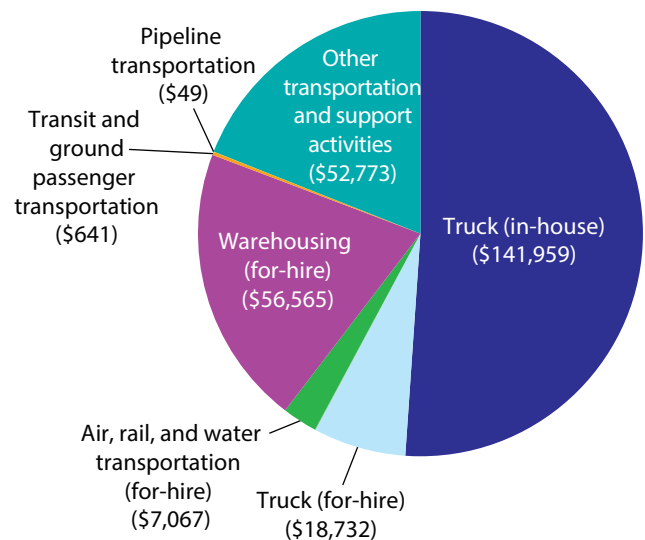
Of the \$277.9 billion of transportation services used (figure 6-4), the wholesale and retail trade sector used:

- Primarily in-house (\$141,959 million) and for-hire (\$18,732 million) truck transportation services (e.g., used to carry goods, such as clothing and food, to stores), which accounted for almost 60 percent (\$160,691 million total) of all transportation services used. In-house truck transportation operations accounted for about half (51.1 percent) of all transportation services used by the sector.
- A significant amount of warehousing and other transportation services (parcel delivery, courier, and messenger services excluding U.S. Postal Service, transportation support activities such as freight loading, etc.). Warehousing accounted for 20.4 percent (\$56,565 million) of the transportation services used by the wholesale and retail trade sector, and other transportation services accounted for 19 percent (\$52,773 million).
- A small amount of for-hire air, rail, and water transportation services (\$7,067 million), which collectively accounted for 2.5 percent of the transportation services used.
- A smaller amount of for-hire pipeline transportation (\$49 million) and transit and ground passenger transportation services (\$641 million) (e.g., bus transportation purchased for workers) than any other transportation mode.

The wholesale and retail trade sector depended on transportation more than any other sector in 2016, requiring 9.0¢ worth of transportation

services to produce a dollar of output. The sector required more in-house transportation operations (4.6¢ to produce a dollar of output) than for-hire transportation services (4.4¢ to produce a dollar of output)². The wholesale and retail trade sector also required the most in-house transportation operations per dollar of output in 2016 (figure 6-5).

Figure 6-4 Wholesale and Retail Trade Sector's Use of Transportation by Mode, 2016



Total use of transportation = \$277.9 billion

NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. Transit and passenger ground transportation excludes State and local government passenger transit. Other transportation includes sightseeing transportation. The wholesale and retail trade sector used \$91 million in-house air, rail, and water transportation in 2016.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Transportation services were the second most important input for the wholesale and retail trade sector to produce one dollar of output. The

² In-house and for-hire transportation requirements add to more than total transportation requirement due to rounding.

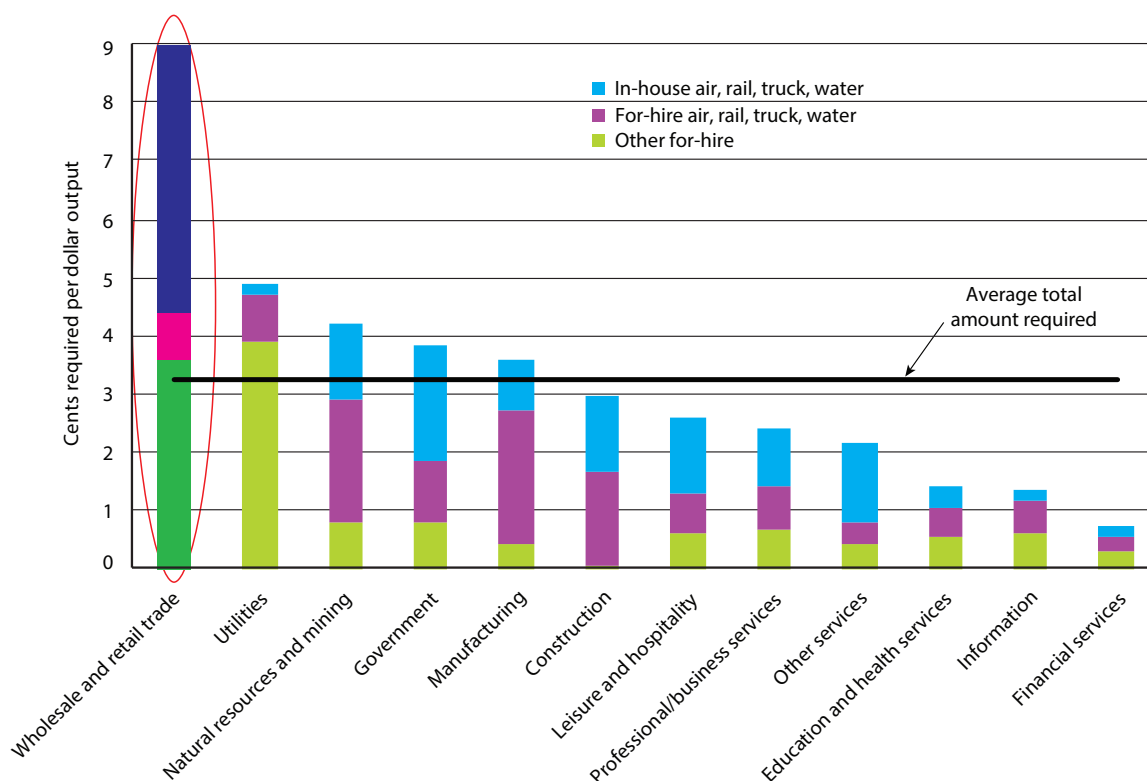
wholesale and retail trade sector required slightly more professional and business services (11.2¢ to produce one dollar of output), such as advertising services, payroll services, etc., than transportation services (9.0¢) to produce one dollar of output (figure 6-6).

In 2016 the wholesale trade industry employed nearly 1.2 million transportation and material moving workers, accounting for 19.9 percent of its entire work force. The retail trade industry employed slightly more than 1.0 million transportation and material moving workers,

accounting for 6.6 percent of its entire work force. Both industries employed more material moving workers (the wholesale trade industry employed 589,960 material moving workers and the retail trade industry employed 624,410) than transportation workers (the wholesale trade industry employed 574,350 transportation workers and the retail trade industry employed 428,030)³ (figure 6-7). Transportation workers

³ Total for transportation occupations includes supervisors of material moving workers, which could not be separated from supervisors of transportation workers.

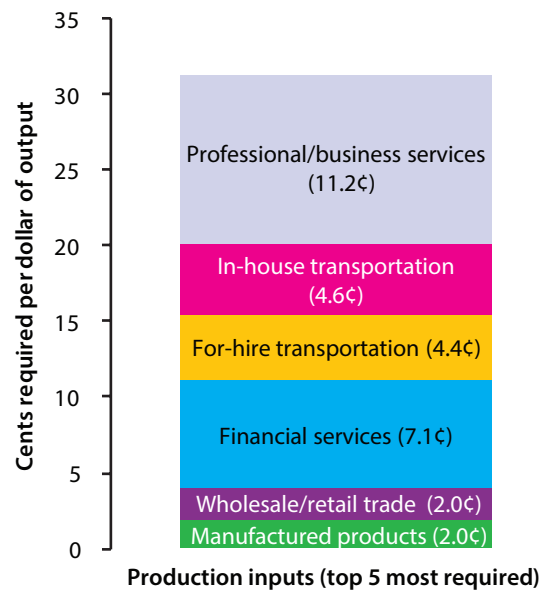
Figure 6-5 Transportation Required Per Dollar of Output by the Wholesale and Retail Trade Sector, 2016



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Figure 6-6 Top 5 Most Required Inputs by Wholesale and Retail Trade Sector to Produce a Dollar of Output, 2016



SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

include motor vehicle operators, ship engineers, aircraft pilots and flight engineers, etc. Material moving workers support transportation activities and include occupations such as cleaners of vehicles and ship loaders.

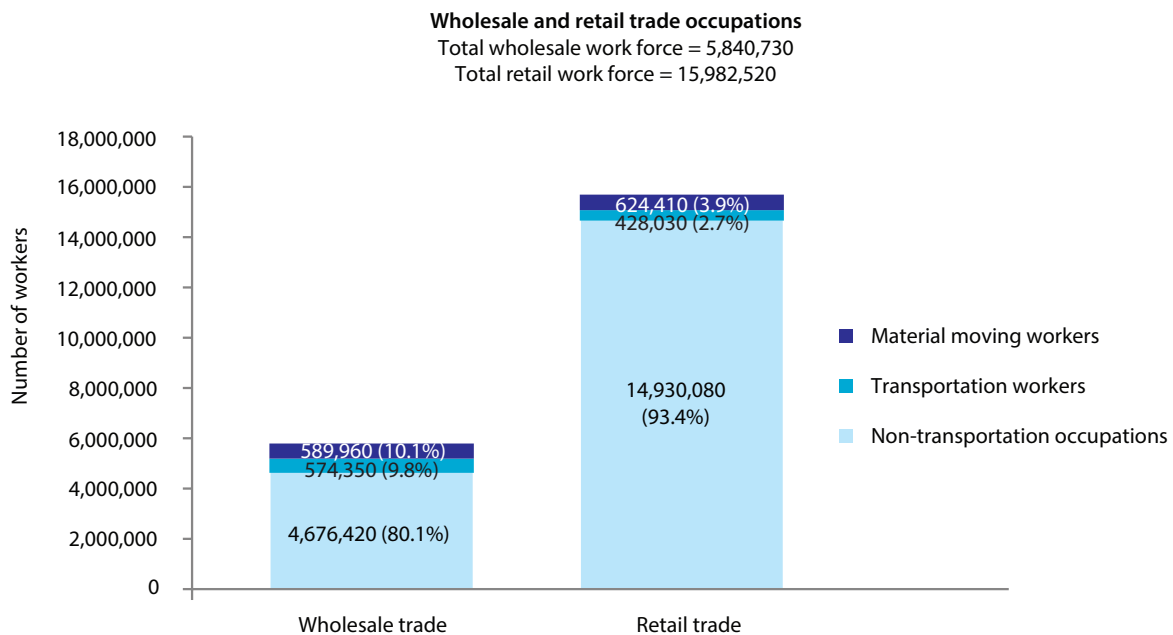
Transportation and material moving workers in the wholesale trade industry earned a median wage of \$31,590 in 2016, while workers of all occupations in the wholesale trade industry earned a higher median wage of \$42,070.

Transportation and material moving workers in the retail trade industry earned a median wage of \$23,650 in 2016, while workers of all occupations in the retail trade industry earned a marginally higher median wage of \$24,260. (figure 6-8)

The wholesale trade industry employed the largest number of transportation workers as

heavy and tractor-trailer truck drivers (206,790) followed by light truck or delivery drivers (166,380) and driver/sales workers (116,500). Heavy and tractor-trailer truck drivers earned a higher median wage of \$40,330 than light truck or delivery service drivers (\$29,950) and driver/sales workers (\$33,360) employed in the wholesale industry. Heavy tractor-trailer truck drivers, drivers/sales workers, and light truck or delivery service operators all earned less than the industry median wage (figure 6-8).

The retail trade industry employed the largest number of transportation workers as light truck/delivery services drivers (208,280) followed by driver/sales workers (55,880) and automotive and watercraft service attendants (55,300). The median wage for these three occupations is nearly the same. Light truck/delivery services

Figure 6-7 Number of Workers Employed in the Wholesale and Retail Trade Sector, 2016

NOTE: Total for transportation occupations includes supervisors of material moving workers, which could not be separated from supervisors of transportation workers.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

drivers employed in the retail trade industry earned a median wage of \$24,170, driver/sales workers earned a median wage of \$25,760, and automotive and watercraft service attendants earned a median wage of \$22,570 (figure 6-8).

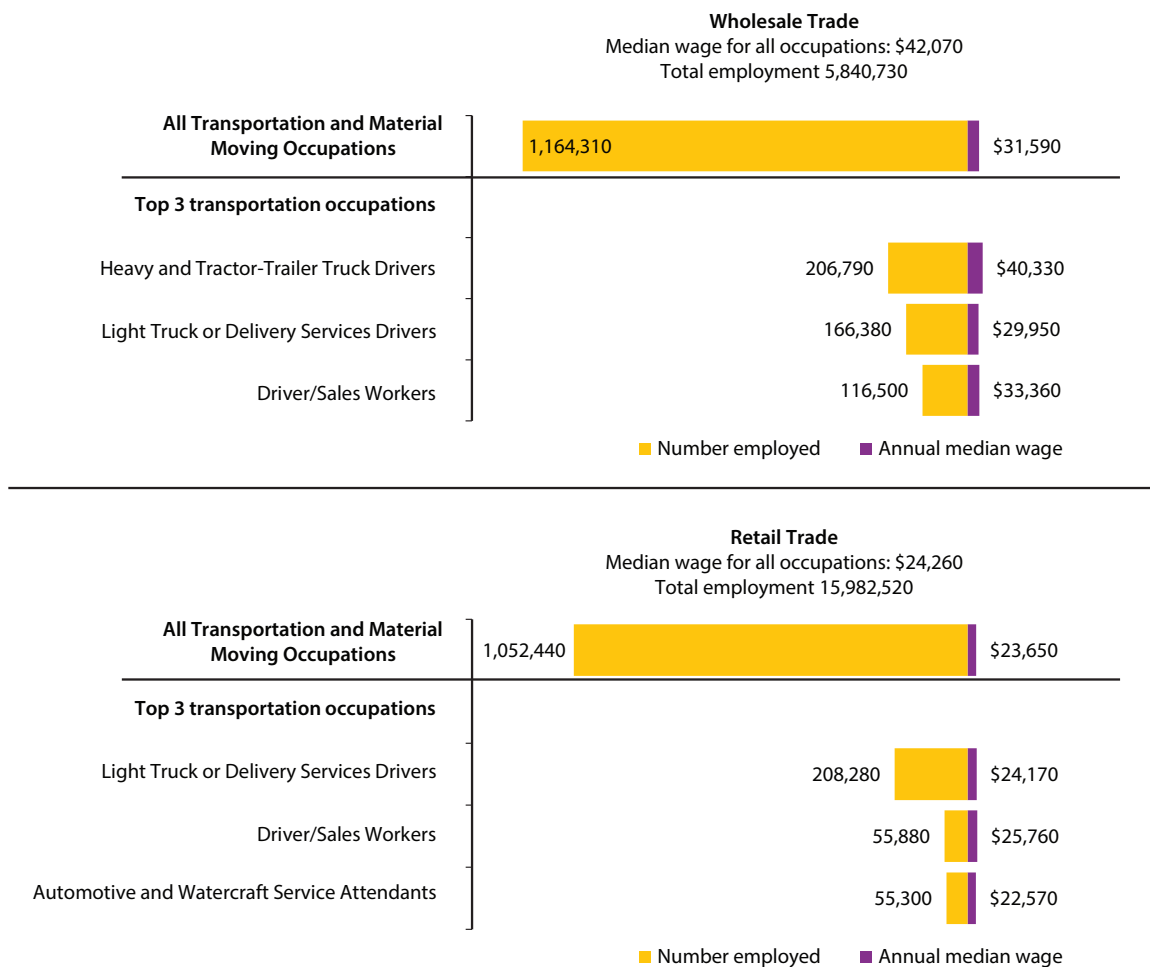
The 2002 Vehicle Inventory and Use Survey (VIUS) is the most recent survey of vehicle ownership and use by industry. According to the 2002 VIUS, the wholesale and retail trade industry operated the third largest number of trucks (2.3 million) and accumulated the second largest number of miles (44.4 billion) (figure 6-9).

The 2012 Commodity Flow Survey shows that the wholesale trade industry shipped 3.8 billion tons of raw materials and finished goods domestically, valued at \$6.1 trillion, and accounting for 723.2 billion ton-miles. Trucking was the dominant

mode. Trucks carried 81.8 percent of the tonnage shipped by the wholesale industry, 78.2 percent of the value, and accounted for 55.4 percent of ton-miles. The wholesale trade industry, however, tended to use modes other than truck to ship goods long distances. The average shipment distance was shorter by truck (176 miles per shipment) than by all other modes and longest by air (1,163 miles per shipment) (figure 6-10).

Commodity flow data are not available for the retail trade industry.

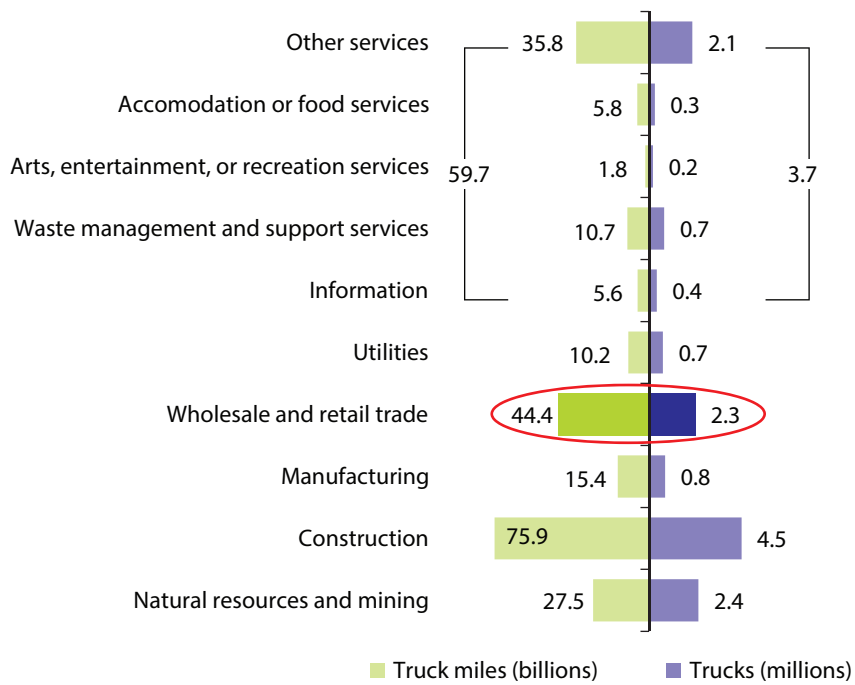
Figure 6-8 Median Annual Wage and Employment for Most Common Transportation Occupations (Top 3) in Wholesale and Retail Trade Sector, 2016



NOTE: Top three transportation occupations are the transportation occupations employing the largest number of workers and are selected from detailed occupation group in Bureau of Labor Statistics Occupational Employment and Wages table. Material moving occupations not included in the selection of the top three transportation occupations.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

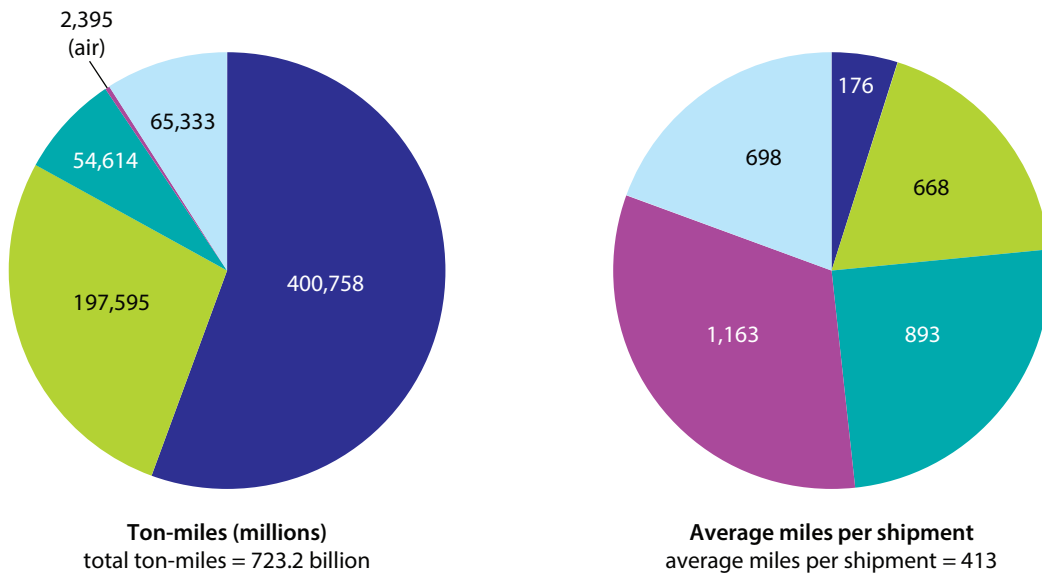
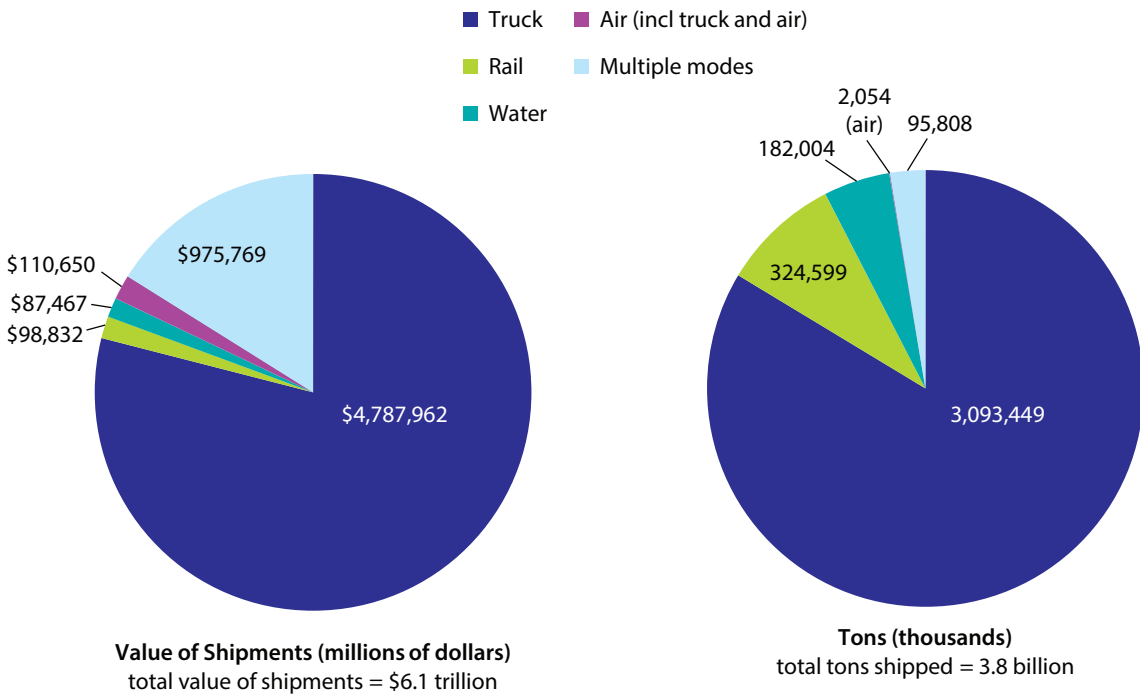
Figure 6-9 Trucks Used and Truck Miles Accumulated for Business by the Wholesale and Retail Trade Industry, 2002



NOTE: Totals for trucks in use only.

SOURCE: U.S. Census Bureau, 2002 Economic Census Vehicle Inventory and Use Survey, Table 2a, available at <https://www.census.gov/prod/ec02/ec02tv-us.pdf> as of August 2012

Figure 6-10 Characteristics for Shipments Made by the Wholesale Industry by Mode of Transportation, 2012



NOTES: Value for pipeline data suppressed. Value for modes may not sum to total due to rounding and data suppression.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Commodity Flow Survey 2012, available at www.bts.gov as of October 2015.

CHAPTER 7 SERVICE SECTORS



The following provides an overview of the contribution of the service sectors to the economy and the use of transportation by the sectors.

There are six service sectors: (1) information; (2) financial services; (3) professional and business services; (4) education and health services; (5) leisure and hospitality; and (6) other services.

The information sector consists of establishments engaging in the production and distribution of information and cultural products and the processing of data.

The financial services sector consists of services related to finance and insurance activities as well as real estate, rental, and leasing. With regards to finance and insurance, the sector includes establishments engaging in financial transactions (transactions involving the creation, liquidation, or change in ownership of financial assets) and/or facilitating financial transactions. With regards to real estate, rental, and leasing, the sector includes establishments engaging in the rental or leasing of tangible (e.g., real estate, equipment, etc.) or intangible (e.g., patents) assets and establishments providing related services.

The professional and business services sector consists of professional, scientific, and technical services; management of companies and enterprises; and administrative and support and waste management and remediation services. It includes logistics consulting services used in moving goods from point of origin to point of consumption.

The education and health services sector consists of establishments that provide instruction and training (e.g., schools, universities, training centers, etc.) and establishments that provide health care and social assistance for individuals.

The leisure and hospitality sector consists of establishments providing art, entertainment, and recreation services as well as establishments providing accommodation and food services.

Other services consist of establishments providing services not captured elsewhere, such as equipment and machinery repair, religious activities, grant making, advocacy, personal care services, etc.¹

The service sectors collectively use the second largest dollar amount of transportation services. However, per dollar of output, each service sector requires less transportation than most other sectors. The service sectors collectively rely heavily on truck transportation, primarily in-house truck

¹ U.S. Department of Labor, Bureau of Labor Statistics, Industries at a Glance, www.bls.gov/iag/tgs/iag_index_naics.htm, as of March 30, 2018

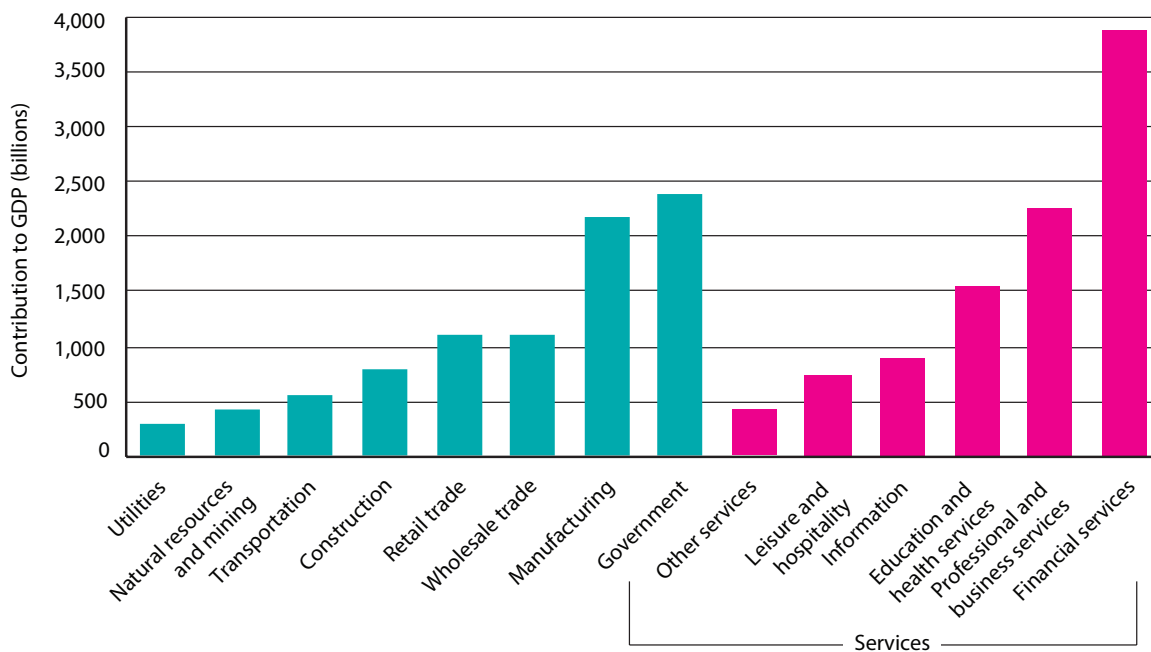
Table 7-1 Overview of the Service Sectors' Contribution to Gross Domestic Product (GDP) and Use of Transportation

Service Sectors	Value	Year (latest year where data available)
Contribution to GDP	\$9,761.9 billion	2016
Use of transportation	\$246.5 billion	2016
Amount of transportation required to produce a dollar of output		
Information	1.3¢	2016
Financial services	0.7¢	2016
Professional/ business services	2.4¢	2016
Education and health services	1.4¢	2016
Leisure and hospitality	2.6¢	2016
Other services	2.2¢	2016
Number of transportation and material moving workers		
Information	46,080	2016
Financial services	139,200	2016
Professional/ business services	1,228,500	2016
Education and health services	397,090	2016
Leisure and hospitality	321,210	2016
Other services	397,690	2016
Transportation and material moving workers as percent of sector's work force		
Information	1.7%	2016
Financial services	1.8%	2016
Professional/ business services	6.1%	2016
Education and health services	1.2%	2016
Leisure and hospitality	2.1%	2016
Other services	9.8%	2016
Median annual wage of transportation and material moving workers		
Information	\$27,310	2016
Financial services		
Finance and insurance	\$32,660	2016
Real estate and rental and leasing	\$26,610	2016
Professional/business services		2016
Professional, scientific, and technical services	\$29,890	2016
Management of companies and enterprises	\$33,420	2016
Administrative and support and waste management and remediation services	\$24,470	2016
Education/health services		2016
Educational services	\$29,960	2016
Health care and social assistance	\$24,870	2016
Leisure/hospitality		2016
Arts, entertainment, and recreation	\$26,060	2016
Accommodation and food services	\$19,630	2016
Other services (except public administration)	\$22,500	2016
Number of trucks used	3,719 thousand	2002
Truck miles accumulated	59,708 million	2002

NOTE: Table presents latest data available, as of March 2018.

Data on number of trucks and truck miles accumulated was last collected in the Vehicle Inventory and Use Survey for 2002.

SOURCE: Data for this table is drawn from figures and tables presented throughout this chapter.

Figure 7-1 Service Sectors' Contribution to Gross Domestic Product, 2016

NOTE: 2016 GDP = \$18,624 billion

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry, available at <http://bea.gov> as of March 2018.

transportation, and employ a large number in a variety of transportation occupations such as bus drivers, light truck/delivery services drivers, commercial pilots, parking lot attendants, etc.

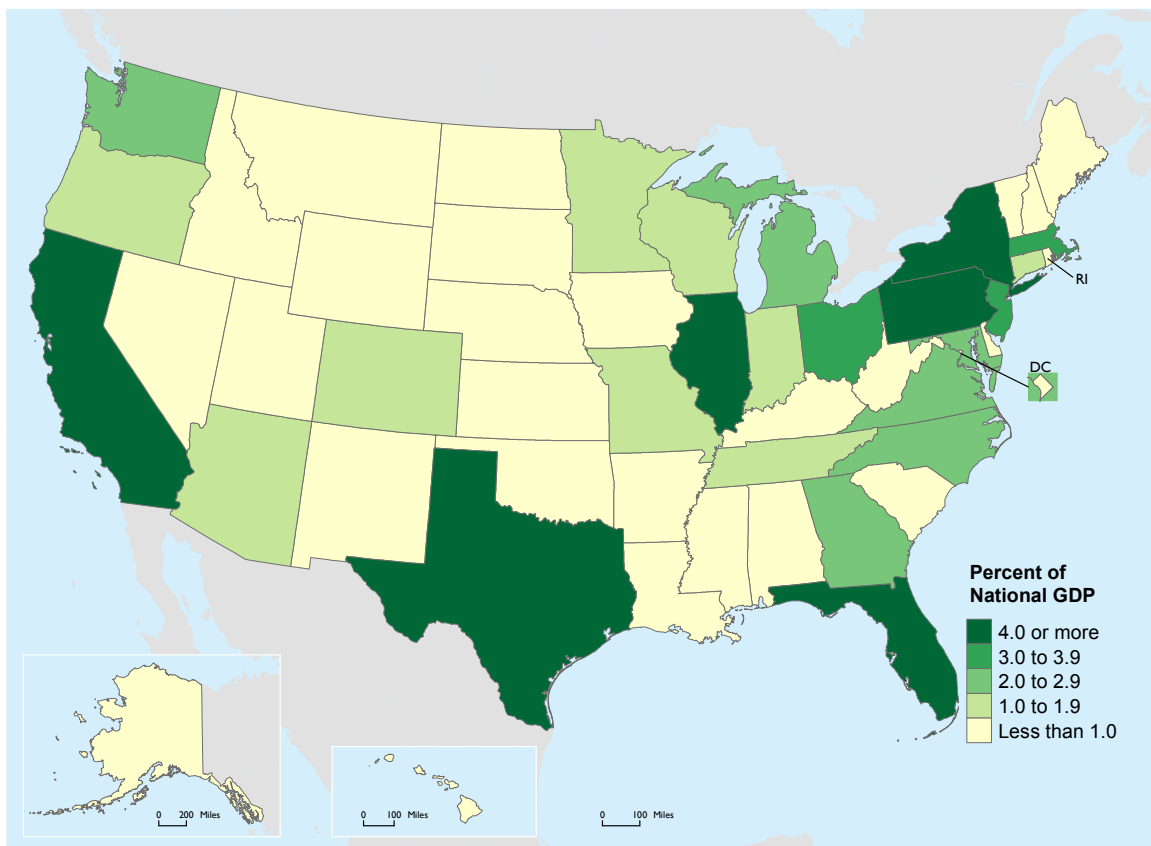
The contribution of the service sectors to the national economy has grown. In 1997 the service sector contributed 46.2 percent, 49.5 percent in 2007, and 52.4 percent in 2016. In 2016 the service sectors collectively contributed \$9,761.9 billion (52.4 percent) to the national economy, as measured by gross domestic product (GDP). The financial services sector contributed more than all other service sectors.

The largest amount of service sector activity occurred in California (\$1,483.5 billion), followed

by New York (\$1,020.2 billion), Texas (\$674.8 billion), Florida (\$536.7 billion), Illinois (\$437.3 billion), and Pennsylvania (\$400.6 billion)— each of which accounted for 4 percent or more of national activity in the services sectors (figure 7-2, table 7-2).

California, New York, Texas, Florida, Illinois, and Pennsylvania contributed the most to national economy related to services and the most to national activity overall (they also have the largest gross state product (GSP)). Texas contributed more to the national economy than New York in 2016, but New York contributed more in terms of service sector activity to the national economy due to significantly higher activity in almost all service sectors (Appendix A).

Figure 7-2 State Contributions to Service Related GDP (percent of national GDP related to service sector activity), 2016



SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

Table 7-2 States Contributing 4.0 Percent or More to National GDP Related to Service Sectors in 2016

State	All service sectors (Service related GDP = \$9,761.9 billion)			All products and services (Total national GDP = \$18.5 trillion)	
	Service related GDP (billions)	Percent of national GDP related to services	Rank (1=contributes most to national GDP related to services, 51=least)	Dollar contribution to national GDP (billions)	Rank (1=contributes most to national GDP, 51=least)
California	1,483.5	15.2	1	2,622.7	1
New York	1,020.2	10.5	2	1,500.1	3
Texas	674.8	6.9	3	1,599.3	2
Florida	536.7	5.5	4	926.0	4
Illinois	437.3	4.5	5	796.0	5
Pennsylvania	400.6	4.1	6	719.8	6

NOTE: This table presents the latest available data which do not sum to latest available industry totals as shown in figures 1-1 and 7-1. Data shown in figures 1-1 and 7-1 are based on U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry table, available at <http://bea.gov> as of March 2018.

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

Computing the percent of service sector activity as a percent of GSP, rather than as a share of GDP, also provides useful insights to U.S. production. Nationally, California leads in service sector activity in 2016. However, service sector activity accounted for a smaller share of GSP in California (56.6 percent) than in Delaware (70.0 percent, or \$50 billion) and New York (68 percent, or \$1,020.2 billion)— the two States where service sector activity accounted for more than two-thirds of GSP in 2016 (see Appendix A).

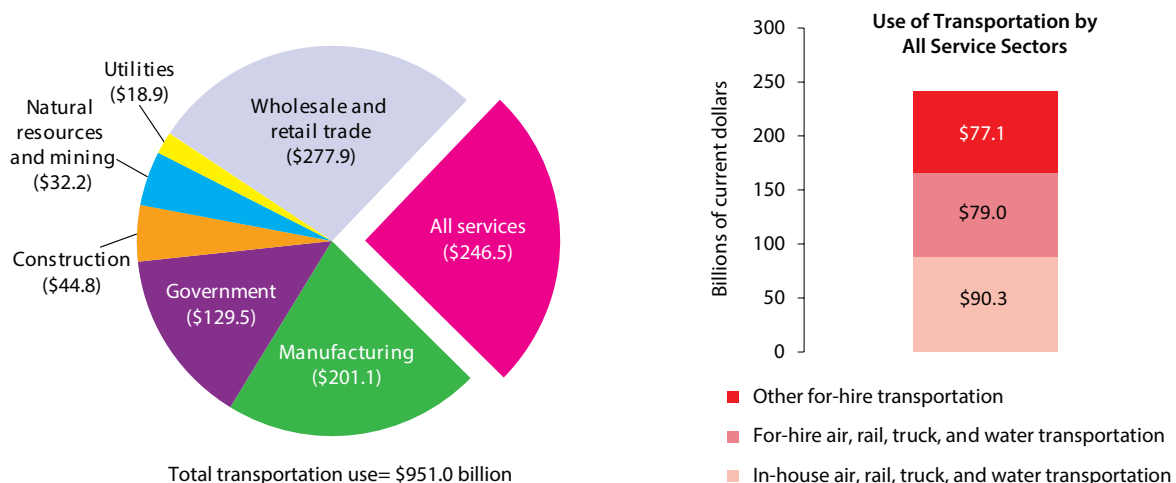
The service sectors combined were the second largest user of transportation services in 2016 (\$246.5 billion). Looking at the use of air, rail, truck, and water transportation, the combined service sectors used more in-house services (\$90.3 billion) than for-hire (\$79 billion) operations (figure 7-3)².

² Data for previous years have been revised since last release. Due to changes in the source data, the numbers in this release is not comparable to those in our previous release.

Of the \$246.5 billion of transportation services (figure 7-4) used in 2016, the service sectors collectively used:

- Primarily truck transportation services (e.g., for transporting linens and other products to hotels), which accounted for 44.4 percent (\$109,527 million) of all transportation services used by the sector.
- About 3.2 times more in-house truck operations (\$83,570 million) than for-hire truck transportation (\$25,957 million).
- In-house truck transportation operations accounted for slightly more than one-third (34 percent) of all transportation services used by the service sectors, while for-hire accounted for only 11 percent.
- A relatively large amount of other transportation and support activities

Figure 7-3 Use of Transportation by the Service Sectors, 2016 (current dollars, billions)



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government passenger transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

(sightseeing, parcel delivery, courier, and messenger services excluding U.S. Postal Service, transportation support activities such as freight loading, etc.). Other transportation and support services (e.g., sightseeing by bus or boat and vehicle cleaning services) accounted for 18.5 percent (\$45,577 million) of the transportation services used by the service sectors.

- A modest amount of for-hire transit and ground passenger transportation (e.g., bus transportation purchased for workers)

totaling 8.2 percent (\$20,157 million) of the transportation services used by the service sectors.

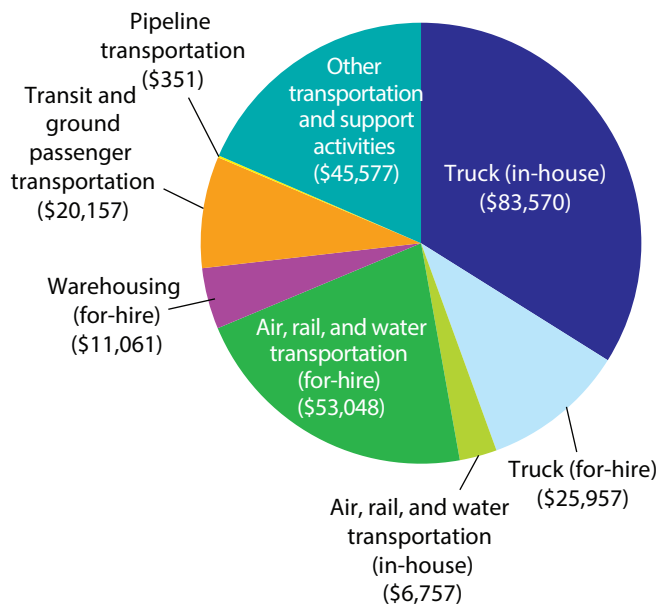
- Warehousing (e.g., storage for medical records, etc.) summing to 4.5 percent (\$11,061 million) of all transportation services used by the service sectors (figure 7-4).

While the service sectors collectively were the second largest user of transportation services, they individually did not depend as heavily on transportation as other sectors in 2016. The leisure and hospitality sector required the most transportation services to produce one dollar of output (requiring 2.6¢) among services sectors but much less than the wholesale and retail trade, which required the most transportation services (9.0¢) to produce one dollar of output.

Among service sectors, the professional and business services required the second largest amount of transportation services to produce one dollar of output (2.4¢) in 2016 followed by other services sector (e.g., grant-making, dry cleaning, machinery repair, etc.) (2.2¢), education and health services (1.4¢), information (1.3¢), and the financial services sector (0.7¢) (figure 7-5).

All of the service sectors relied less on transportation services than other commodities in producing output in 2016. Each service sector required 2.6¢ worth of transportation services or less to produce one dollar of output (figure

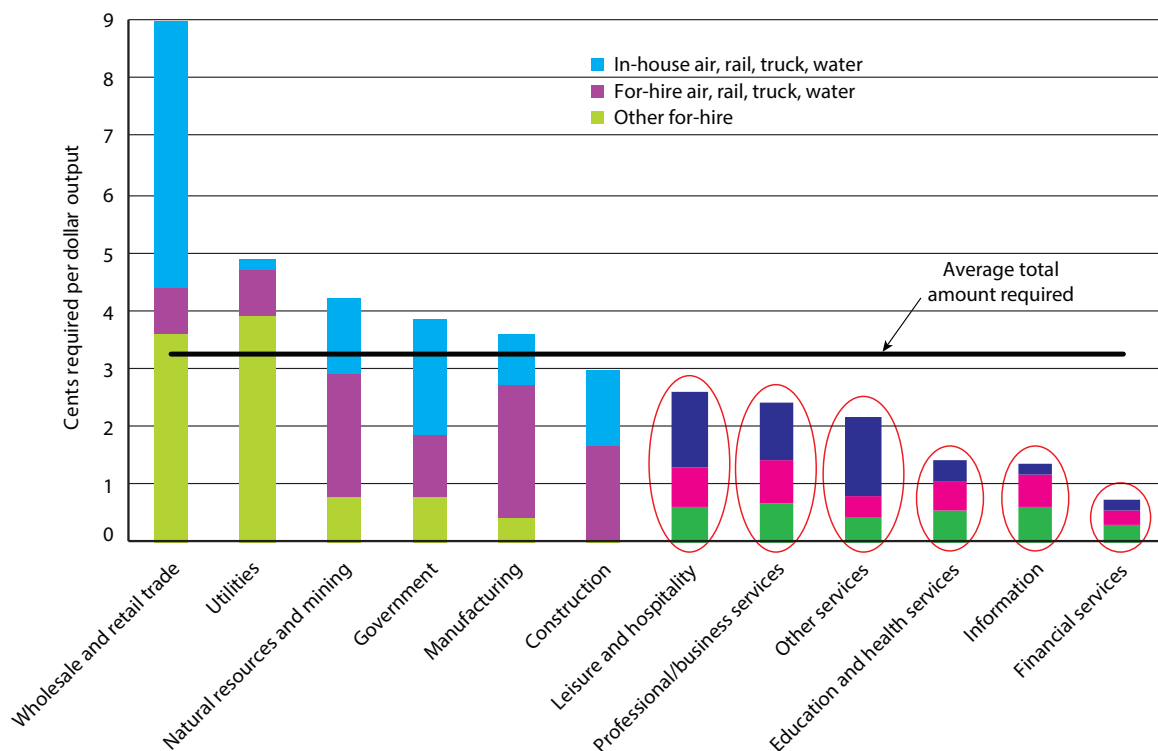
Figure 7-4 Service Sectors' Use of Transportation by Mode, 2016



Total use of transportation = \$246.5 billion

NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. Transit and passenger ground transportation excludes State and local government passenger transit. Other transportation includes sightseeing transportation.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Figure 7-5 Transportation Required Per Dollar of Output by the Service Sectors, 2016

NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

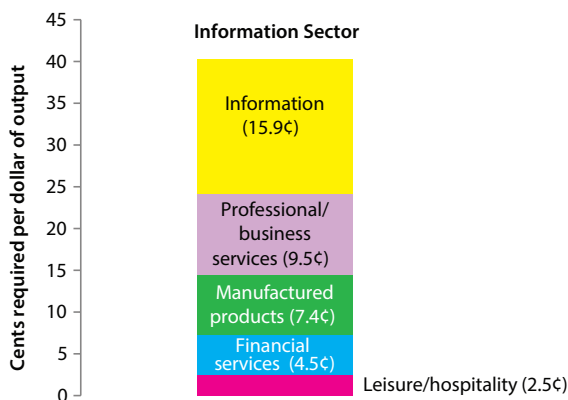
SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

7-5). The leisure and hospitality service sector required the most transportation services (2.6¢) to produce one dollar of output among the service sectors but required substantially more of other commodities. For example, professional and business services were the most important input to the leisure and hospitality services sector, with the sector requiring 11.8¢ worth to produce one dollar of output (figure 7-6).

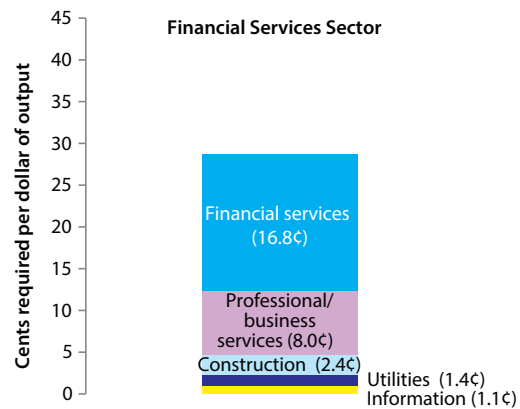
Among the service sectors, the professional and business services sector employed the largest number in transportation and material

moving occupations (1.2 million), accounting for 6.1 percent of its work force in 2016. The other services sector employed the second largest in transportation and material moving occupations (397,690) in 2016, followed by education and health services sector (397,090), the leisure and hospitality sector (321,210), the financial services sector (139,200), and the information sector (46,080) (figure 7-7). Transportation workers include motor vehicle operators, ship engineers, aircraft pilots and flight engineers, etc. Material moving workers support transportation activities

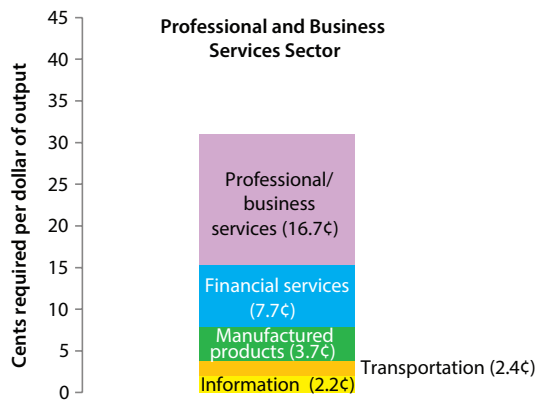
Figure 7-6 Top 5 Most Required Inputs by the Service Sectors to Produce a Dollar of Output, 2016



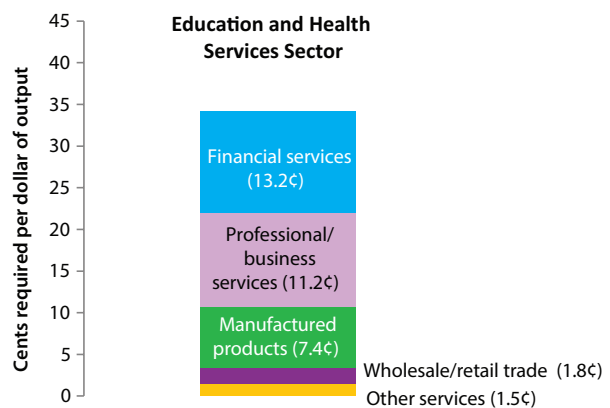
Production Inputs (Top 5 Most Required)



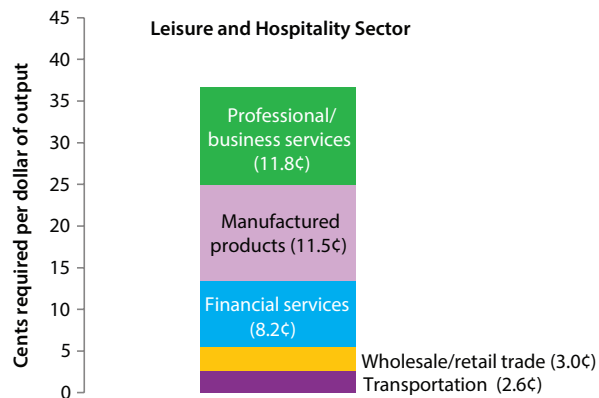
Production Inputs (Top 5 Most Required)



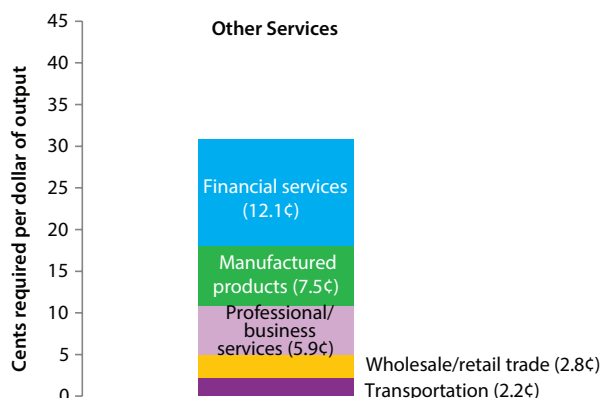
Production Inputs (Top 5 Most Required)



Production Inputs (Top 5 Most Required)



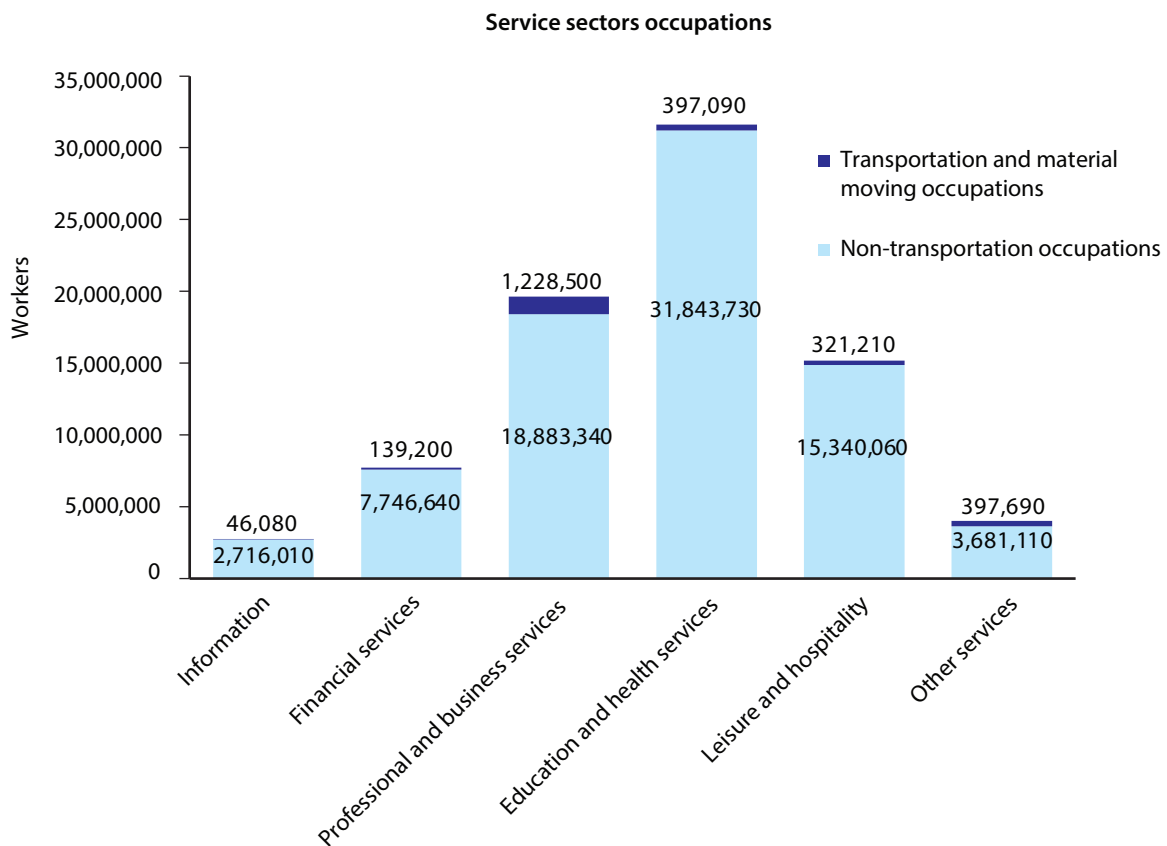
Production Inputs (Top 5 Most Required)



Production Inputs (Top 5 Most Required)

NOTE: Transportation includes in-house and for-hire.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Figure 7-7 Number of Workers Employed in the Service Sectors, 2016

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

and include occupations such as cleaners of vehicles and ship loaders.

Transportation and material moving workers in all service sectors earned a lower median wage than workers of all other occupations in the same service sector except in the arts, entertainment, and recreation sector in 2016. In the arts, entertainment, and recreation sector, transportation and material moving workers earned a median wage of \$26,060, while workers of all other occupations in the arts, entertainment, and recreation industry earned a lower median wage of \$25,570 (figure 7-8).

Each service sector contains several industries. Each industry employed different types of transportation workers. Most industries employed the largest number of transportation workers as motor vehicle operators, ranging from heavy and tractor-trailer truck drivers to taxi drivers and chauffeurs. Of the motor vehicle workers, driver/sales workers earned the lowest median wage. Across industries, driver/sales workers earned the lowest median wage in the accommodation and food services industry (\$19,260). The arts, entertainment, and recreation industry as well as the other services industry employed the largest

Figure 7-8 Median Annual Wage and Employment for Most Common Transportation Occupations (Top 3) in Services Sectors, 2016



Figure 7-8 continued

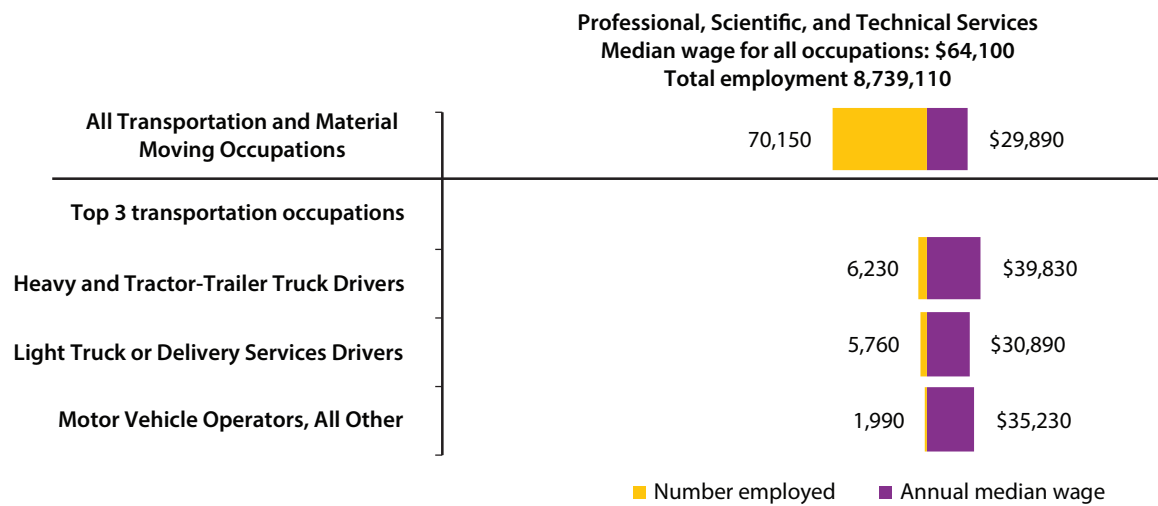
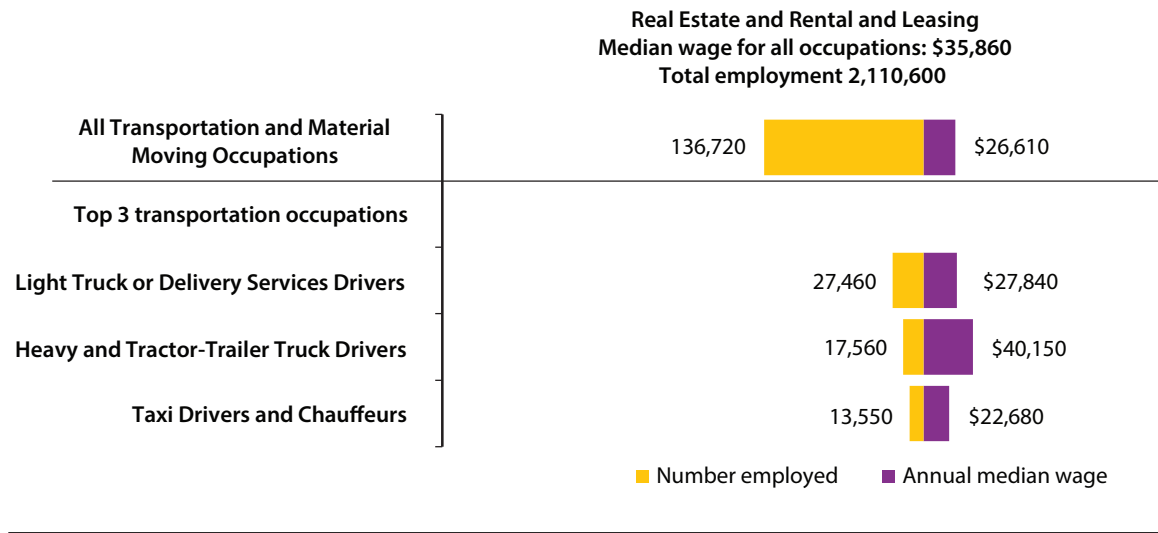


Figure 7-8 continued

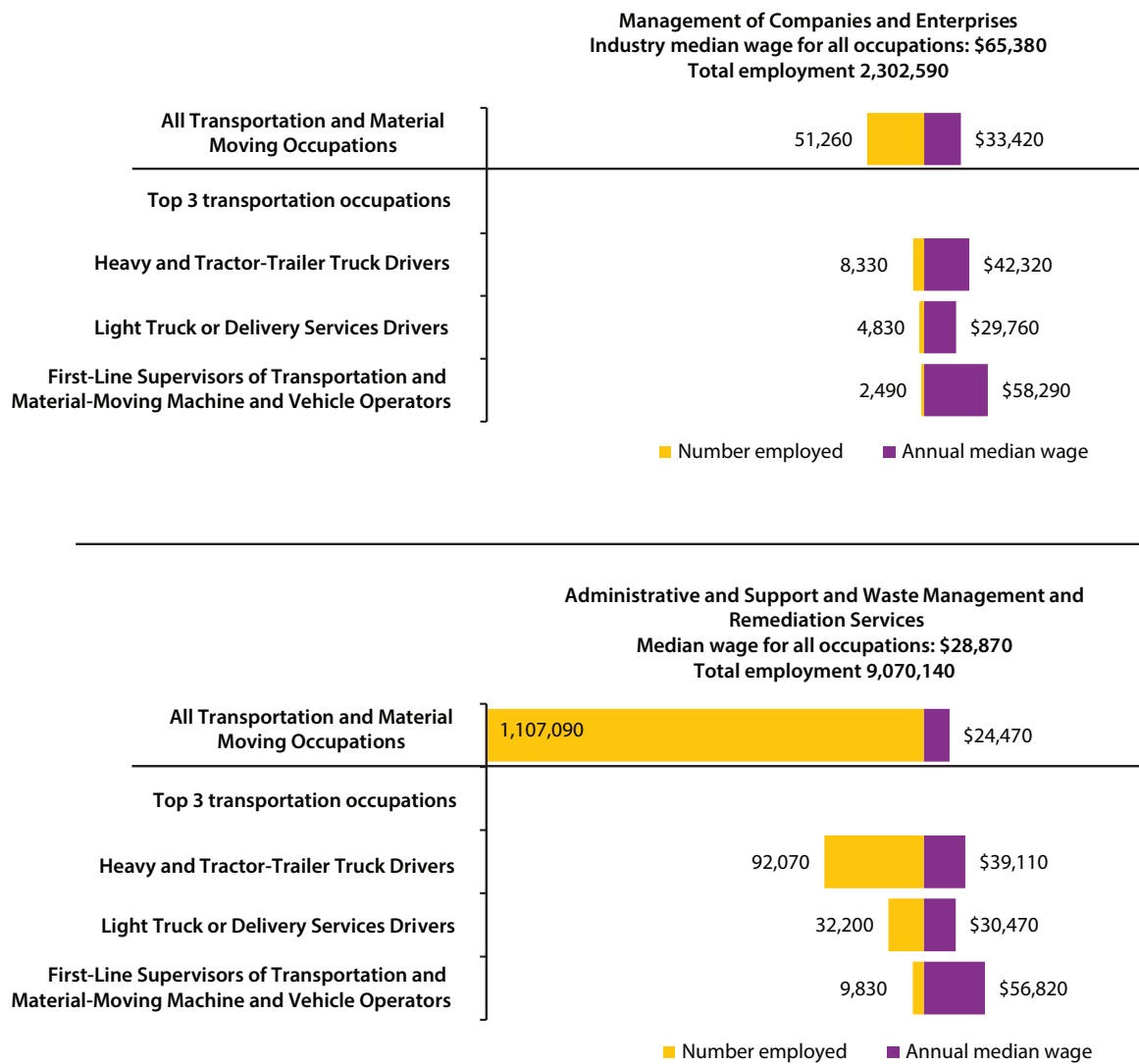


Figure 7-8 continued

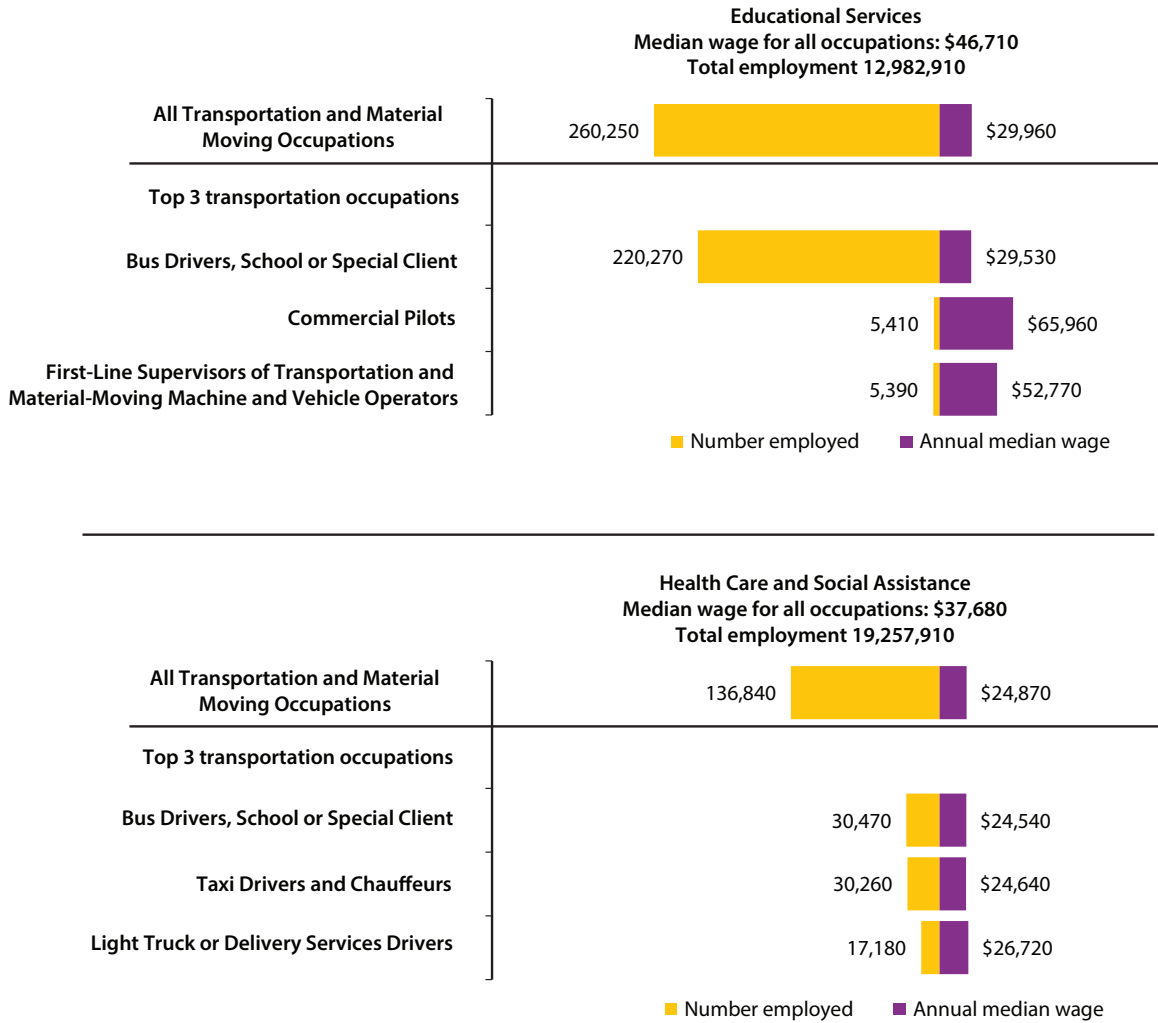
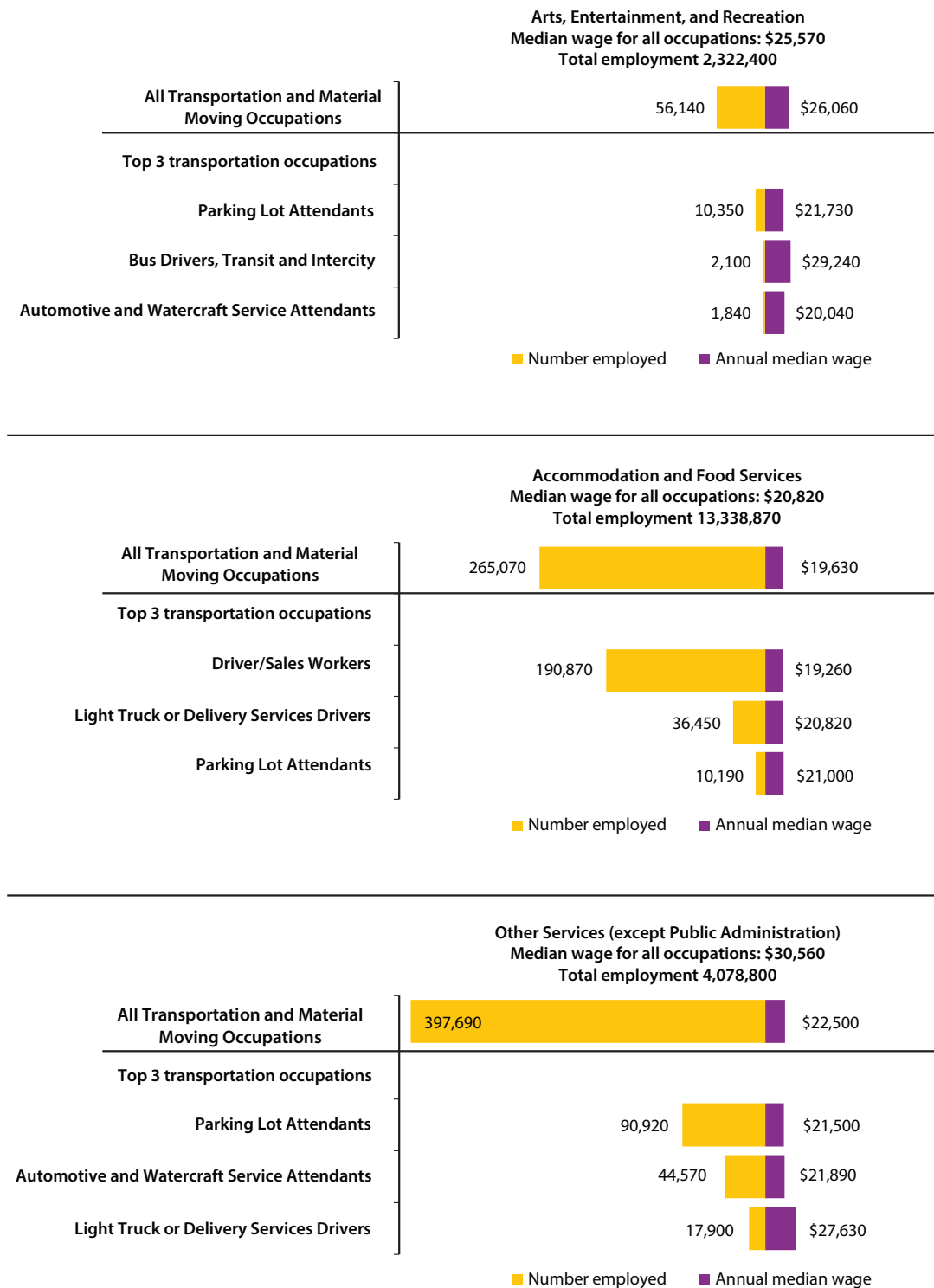


Figure 7-8 continued



NOTE: Median wage is for all occupations within each industry (transportation and non-transportation occupations). Top three transportation occupations are the transportation occupations employing the largest number of workers and are selected from detailed occupation group in Bureau of Labor Statistics Occupational Employment and Wages table.

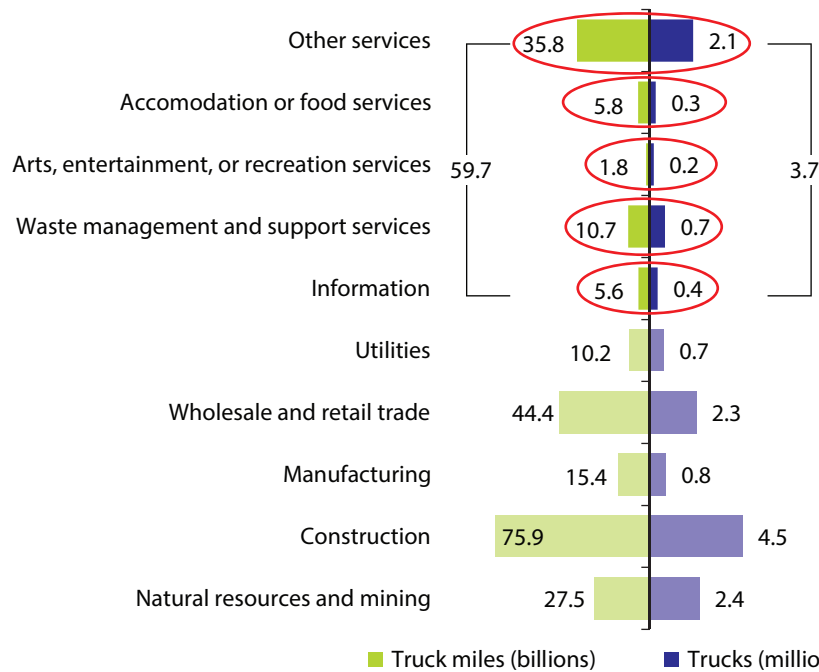
SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

number of transportation workers as parking lot attendants, who earned a relatively low median wage of roughly \$22,000 (figure 7-8).

second largest number of truck miles (59.7 billion).

The 2002 Vehicle Inventory and Use Survey (VIUS) is the most recent survey of vehicle ownership and use by industry. According to the 2002 VIUS, the service industries collectively operated, at 3.7 million, the second largest number of trucks next to the construction industry. The service industries also collectively accumulated the

Figure 7-9 Trucks Used and Truck Miles Accumulated for Business by the Service Industries, 2002



NOTE: Totals for trucks in use only.

SOURCE: U.S. Census Bureau, 2002 Economic Census Vehicle Inventory and Use Survey, Table 2a, available at <https://www.census.gov/prod/ec02/ec02tv-us.pdf> as of August 2012

CHAPTER 8 GOVERNMENT



This chapter provides an overview of the contribution of the government sector to the economy and the use of transportation by the sector.

The government sector includes goods and services provided by all Federal, State, and local government agencies. The government sector includes Federal Government services provided by agencies such as the Departments of Transportation and Defense and State and

local government services, such as welfare services. The government sector also includes Federal, State, and local government enterprises. Government enterprises are government agencies that cover a substantial portion of their operating costs by selling goods and services to the public. The Federal Housing Administration and the Southeastern Power Administration are examples of Federal enterprises. The Alaska Railroad is an example of a State and local government enterprise.

In absolute dollars, the government sector uses the fourth largest amount of transportation services, and also requires the fourth largest amount of transportation per dollar of output. The sector relies heavily on air, rail, and water transportation services but employed the largest number of transportation workers as bus drivers (see table 8-1).

Table 8-1 Overview of the Government Sector’s Contribution to Gross Domestic Product (GDP) and Use of Transportation

Government	Value	Year (latest year where data available)
Contribution to GDP	\$2,399.8 billion	2016
Use of transportation	\$129.5 billion	2016
Amount of transportation required to produce a dollar of output	3.8¢	2016
Number of transportation and material moving workers	389,810	2016
Transportation and material moving workers as percent of sector’s work force	4.1%	2016
Median annual wage of transportation and material moving workers	\$43,410	2016

NOTE: Table presents latest data available, as of March 2018. Data on number of trucks and truck miles accumulated was last collected in the Vehicle Inventory and Use Survey for 2002.

SOURCE: Data for this table is drawn from figures and tables presented throughout this chapter.

In 2016 the government sector contributed \$2,399.8 billion (12.9 percent) to the national economy, as measured by gross domestic product (GDP) (figure 8-1).

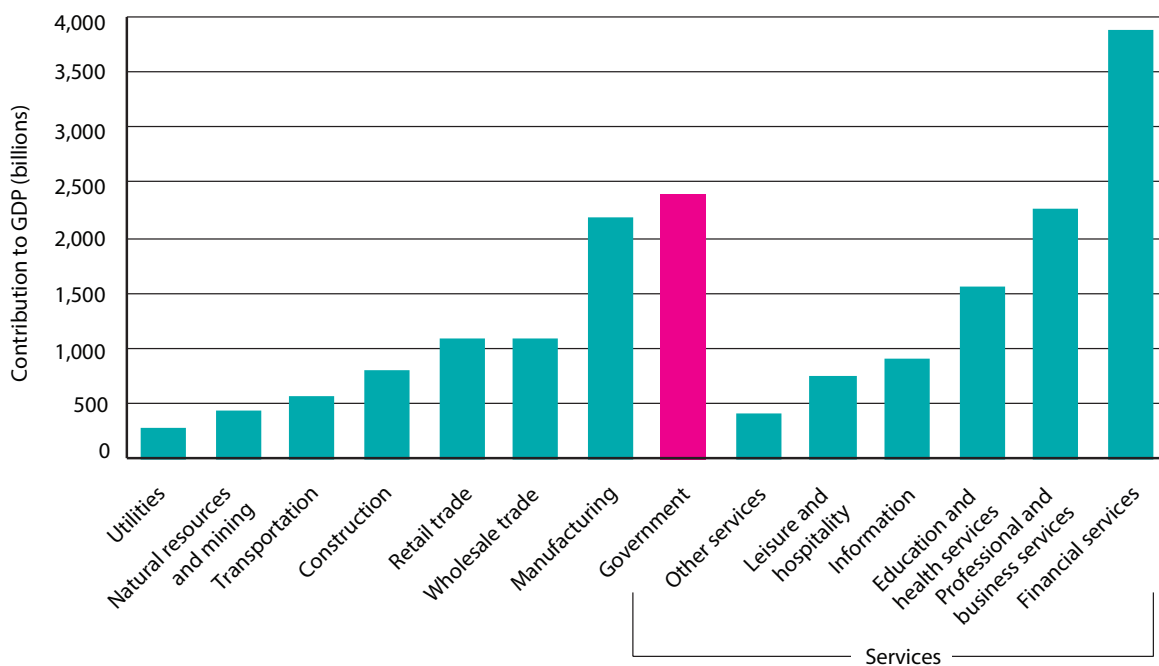
The largest amount of government activity occurred in California (\$319.4 billion), followed by Texas (\$175 billion), New York (\$163.4 billion), Florida (\$108.7 billion), and Virginia (\$92.7 billion)— each of which accounted for 4 percent or more of national activity in the government sector (figure 8-2, table 8-2). With the exception of Virginia, the States contributing the most to national activity in government are States with the largest gross state product (GSP) (table 8-2).

Computing the percent of government sector activity as a percent of GSP, rather than as a share of GDP, also provides useful insights to U.S.

production. Nationally, California, Texas, New York, Florida, and Virginia lead in government sector activity in 2016. The government sector, however, accounted for a smaller share of GSP in California (12.2 percent), Texas (10.9 percent), New York (10.9 percent), Florida (11.7 percent), and Virginia (18.8 percent) than in the District of Columbia (DC). In 2016 government activity accounted for 33.9 percent of GSP in DC (\$42.9 billion) (see Appendix A).

The government sector was the fourth largest user of transportation services in 2016 (\$129.5 billion). Looking at the use of air, rail, truck and water transportation services, the government sector used roughly two times more in-house operations (\$66.6 billion) than for-hire transportation services (\$36.9 billion) (figure 8-3).

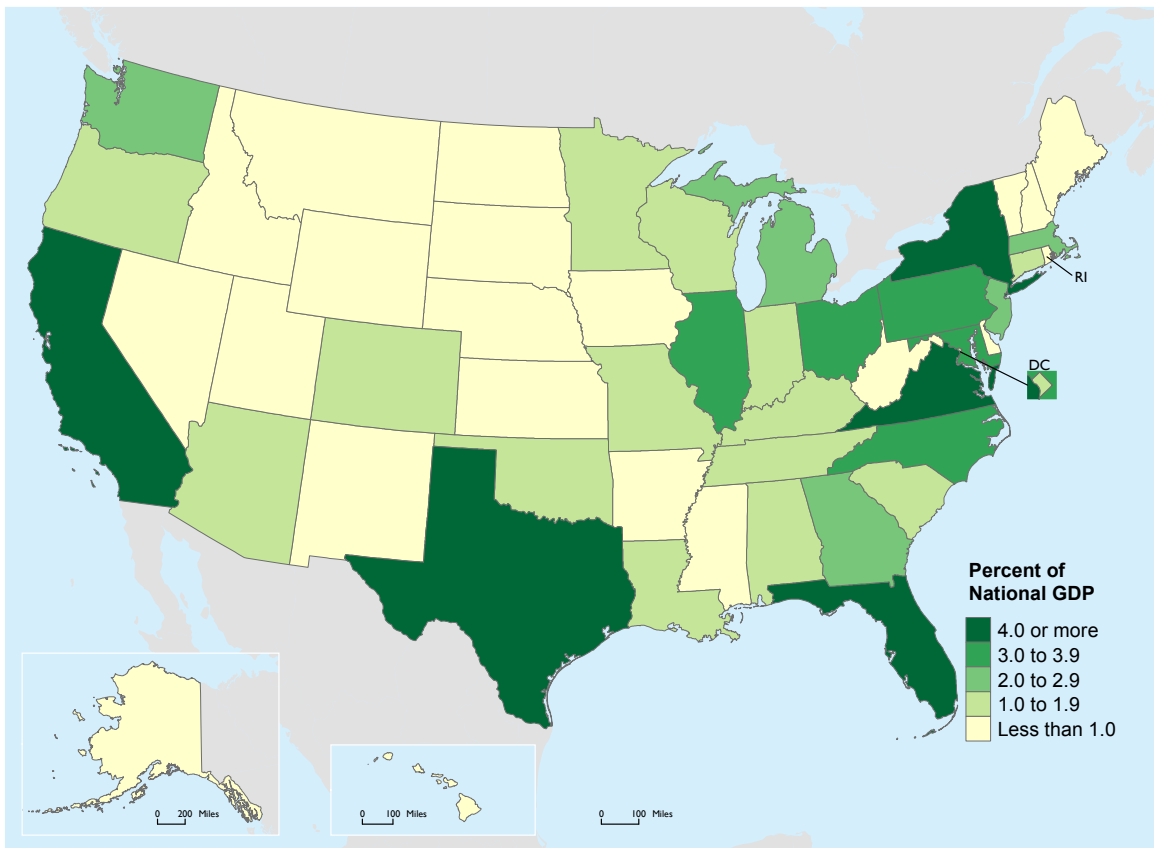
Figure 8-1 Government Sector's Contribution to Gross Domestic Product, 2016



NOTE: 2016 GDP = \$18,624 billion

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry, available at <http://bea.gov> as of March 2018.

Figure 8-2 State Contributions to Government Related GDP (percent of national GDP related to government), 2016



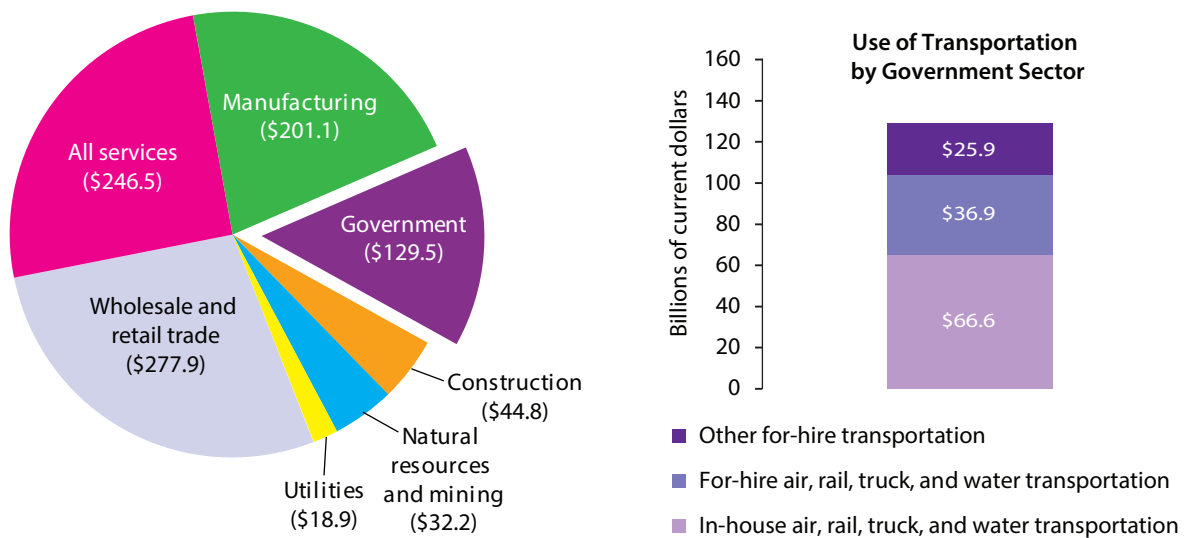
SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

Table 8-2 States Contributed 4.0 Percent or More to National GDP Related to Government Activity in 2016

State	Government (Government related GDP = \$2,286.9)			All products and services (Total National GDP = \$18.5 trillion)	
	Dollar contribution of government related GDP (billions)	Percent of national GDP related to government activity	Rank (1=contributes most to national GDP related to government activity, 51=least)	Dollar contribution to national GDP (billions)	Rank (1=contributes most to national GDP, 51=least)
California	319.4	14.0	1	2,622.7	1
Texas	175.0	7.7	2	1,599.3	2
New York	163.4	7.1	3	1,500.1	3
Florida	108.7	4.8	4	926.0	4
Virginia	92.7	4.1	5	492.9	12

NOTE: This table presents the latest available data which do not sum to latest available industry totals as shown in figures 1-1 and 8-1. Data shown in figures 1-1 and 8-1 are based on U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry table, available at <http://bea.gov> as of March 2018.

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.

Figure 8-3 Use of Transportation by the Government Sector, 2016 (current dollars, billions)

Total transportation use= \$951.0 billion

NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government passenger transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

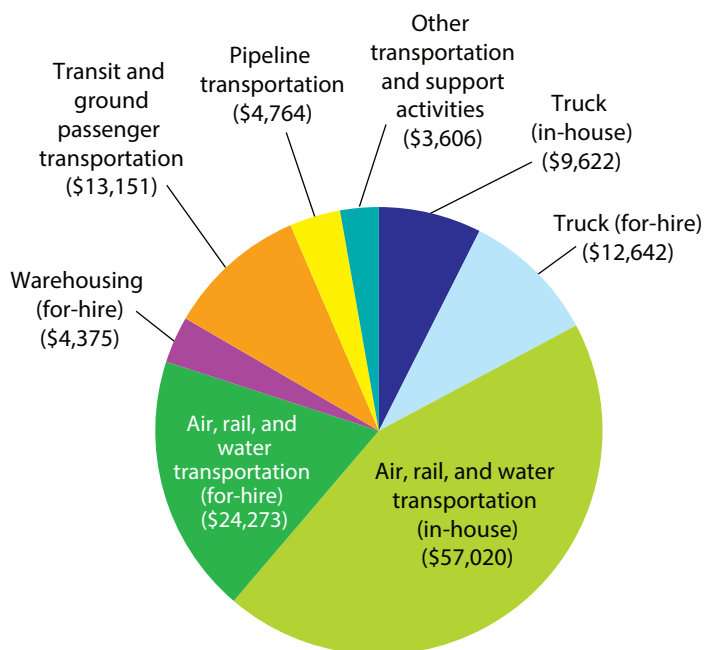
Of the \$129.5 billion of transportation services (figure 8-4), the government sector used:

- Primarily air, rail, and water transportation services (e.g., passenger air travel, shipment of currency, etc.), which accounted for 62.8 percent (\$81,293 million) of all transportation services used by the sector. In-house air, rail, and water transportation services accounted for nearly half (44 percent, or \$57,020 million) of all transportation services used by the sector.
- Less truck transportation services (17.2 percent, or \$22,264 million total) than air, rail, and water transportation services combined (\$81,293 million).
- A relatively large share (10.2 percent, or \$13,151 million) of transit and passenger ground transportation.

The government sector required less than half as much transportation services to produce one dollar of output compared to the most dependent sector (wholesale and retail trade). The government sector required 3.8¢ worth of transportation services to produce one dollar of output in 2016, while the most dependent sector (wholesale and retail trade) required 9.0¢ worth of transportation services to produce one dollar of output (figure 8-5).

The overall transportation requirement for the government sector (3.8¢) is relatively modest

Figure 8-4 Government Sector's Use of Transportation by Mode, 2016 (current dollars, millions)



Total use of transportation = \$129.5 billion

NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. Transit and passenger ground transportation excludes State and local government passenger transit. Other transportation includes sightseeing transportation.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

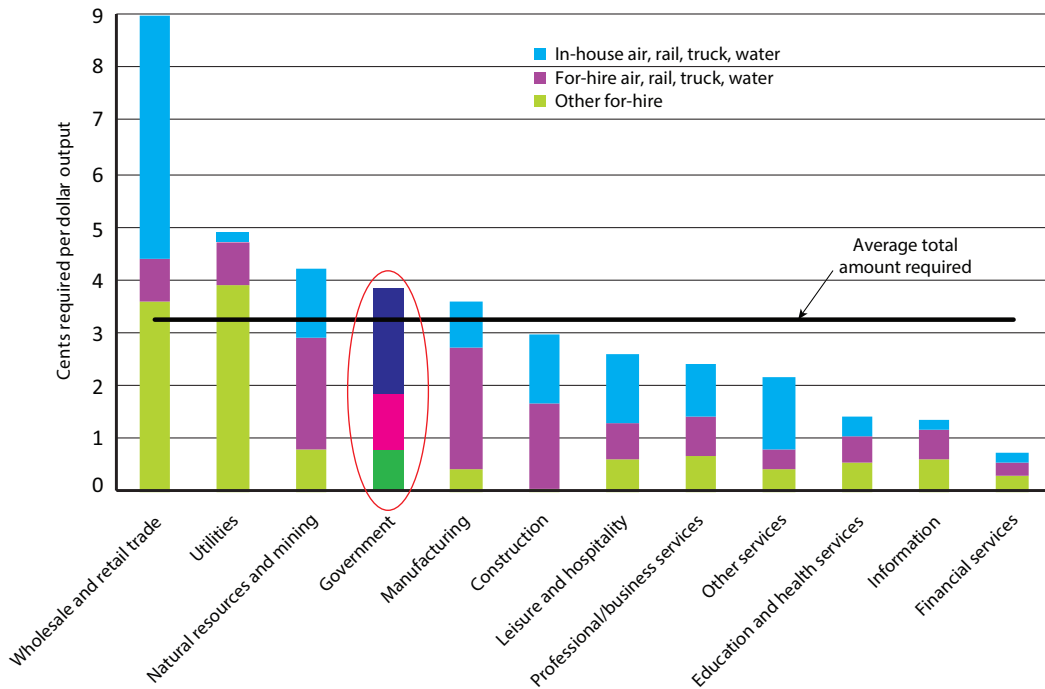
compared to other inputs. In 2016, transportation services were the third most important input, while manufactured products (e.g., paper, furniture, etc.) were the most important input. The government sector required 8.4¢ worth of manufactured products to produce one dollar of output (figure 8-6).

In 2016 the government sector employed 389,810 transportation and material moving workers, accounting for 4.1 percent of its entire work

force. The sector employed more transportation workers (293,630)¹ than material moving workers (96,180) (figure 8-7). Transportation workers include motor vehicle operators, ship engineers, aircraft pilots and flight engineers, etc. Material moving workers support transportation activities and include occupations such as cleaners of vehicles and ship loaders.

¹ Total for transportation occupations includes supervisors of material moving workers, which could not be separated from supervisors of transportation workers.

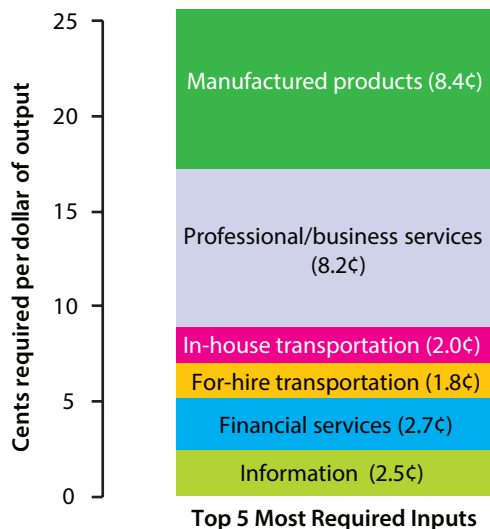
Figure 8-5 Transportation Required Per Dollar of Output by the Government Sector, 2016



NOTE: In-house transportation consists of transportation services (air, rail, truck, and water) provided by nontransportation industries for their own use. For-hire transportation consists of the services provided by transportation firms to industries and the public on a fee-basis. Airlines, railroads, transit agencies, common carrier trucking companies, and pipelines are examples of for-hire transportation industries. "Other" for-hire transportation includes: Transit and passenger ground transportation (excluding State and local government transit); Pipeline; Sightseeing transportation and transportation support; Parcel delivery, courier, and messenger services (excluding U.S. Postal Service); Warehousing and storage; and Other transportation and support activities.

SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

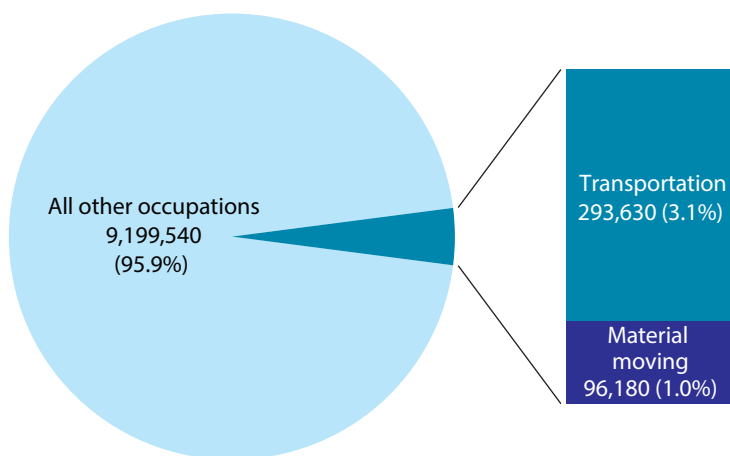
Figure 8-6 Top 5 Inputs Required by the Government Sector to Produce a Dollar of Output, 2016



SOURCE: U.S. Department of Transportation, Bureau of Transportation Statistics, Transportation Satellite Accounts, available at <http://www.bts.gov> as of March 2018.

Figure 8-7 Number of Workers Employed in the Government Sector, 2016

Government occupations
Total work force = 9,589,350



NOTE: Total for transportation occupations includes supervisors of material moving workers, which could not be separated from supervisors of transportation workers.

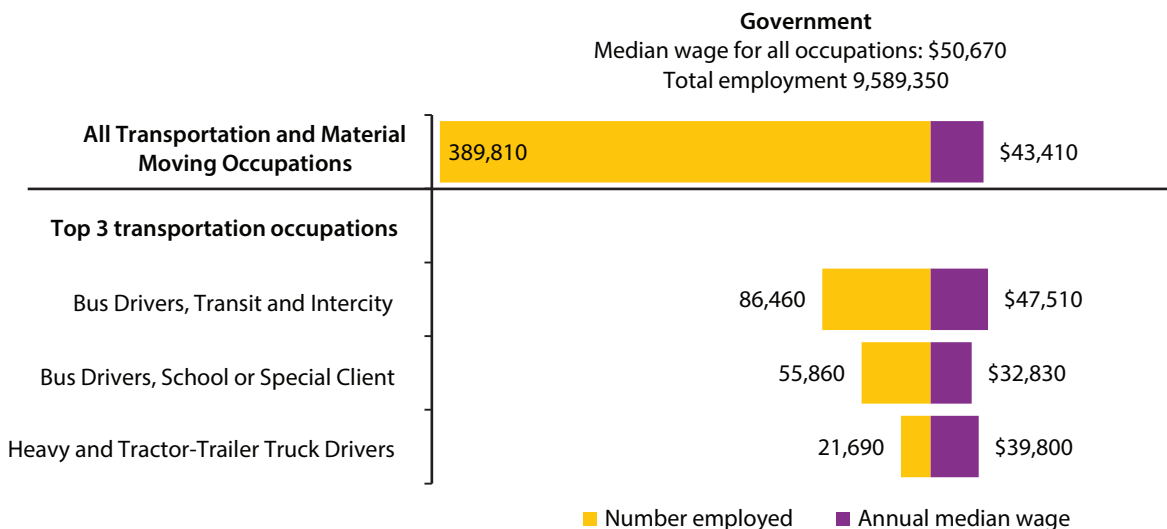
SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

Transportation and material moving workers in the government sector earned a median wage of \$43,410 in 2016, while workers of all occupations in the government sector earned a slightly higher median wage of \$50,670 (figure 8-8).

Bus drivers comprised the largest group of transportation workers in the government sector, accounting for 36.5 percent (142,320) of the sector's transportation and material moving workforce. Bus drivers consist of transit and intercity bus drivers (86,460, or 22.2 percent of

the sector's transportation and material moving workforce) and school/client bus drivers (55,860, or 14.3 percent of the sector's transportation and material moving workforce). Transit and intercity bus drivers earned a slightly higher median wage of \$47,510 than school/client bus drivers (\$32,830). Heavy and tractor-trailer truck drivers accounted for the third largest number of transportation workers in the government sector (21,690) and earned a median wage of \$39,800 (figure 8-8).

Figure 8-8 Median Annual Wage and Employment for Most Common Transportation Occupations (Top 3) in Government Sector, 2016



NOTE: Top three transportation occupations are the transportation occupations employing the largest number of workers and are selected from detailed occupation group in Bureau of Labor Statistics Occupational Employment and Wages table. Material moving occupations not included in the selection of the top three transportation occupations. Material moving occupations not included in the selection of the top three transportation occupations. First-line supervisors of machine and vehicle operators includes first-line supervisors of material moving occupations.

SOURCE: U.S. Department of Labor, Bureau of Labor Statistics, Occupational Employment and Wages, available at <http://www.bls.gov/oes> as of August 30, 2017.

APPENDIX A

GROSS STATE PRODUCT FOR SELECTED INDUSTRIES, 2016

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
0	United States	0	0	All industry total	18,511,499	.	.
6000	California	0	0	All industry total	2,622,731	14.2%	.
48000	Texas	0	0	All industry total	1,599,283	8.6%	.
36000	New York	0	0	All industry total	1,500,055	8.1%	.
12000	Florida	0	0	All industry total	926,049	5.0%	.
17000	Illinois	0	0	All industry total	796,012	4.3%	.
42000	Pennsylvania	0	0	All industry total	719,834	3.9%	.
39000	Ohio	0	0	All industry total	626,622	3.4%	.
34000	New Jersey	0	0	All industry total	575,331	3.1%	.
37000	North Carolina	0	0	All industry total	521,621	2.8%	.
13000	Georgia	0	0	All industry total	531,302	2.9%	.
51000	Virginia	0	0	All industry total	492,932	2.7%	.
25000	Massachusetts	0	0	All industry total	505,776	2.7%	.
26000	Michigan	0	0	All industry total	490,238	2.6%	.
53000	Washington	0	0	All industry total	476,770	2.6%	.
24000	Maryland	0	0	All industry total	382,437	2.1%	.
18000	Indiana	0	0	All industry total	347,249	1.9%	.
27000	Minnesota	0	0	All industry total	339,096	1.8%	.
8000	Colorado	0	0	All industry total	322,644	1.7%	.
47000	Tennessee	0	0	All industry total	331,868	1.8%	.
55000	Wisconsin	0	0	All industry total	313,088	1.7%	.
29000	Missouri	0	0	All industry total	299,113	1.6%	.
4000	Arizona	0	0	All industry total	305,849	1.7%	.
9000	Connecticut	0	0	All industry total	259,918	1.4%	.
22000	Louisiana	0	0	All industry total	236,999	1.3%	.
41000	Oregon	0	0	All industry total	228,886	1.2%	.
1000	Alabama	0	0	All industry total	205,625	1.1%	.
45000	South Carolina	0	0	All industry total	209,859	1.1%	.
21000	Kentucky	0	0	All industry total	196,681	1.1%	.
40000	Oklahoma	0	0	All industry total	181,278	1.0%	.
19000	Iowa	0	0	All industry total	185,183	1.0%	.
20000	Kansas	0	0	All industry total	150,576	0.8%	.
49000	Utah	0	0	All industry total	157,671	0.9%	.
32000	Nevada	0	0	All industry total	146,278	0.8%	.

Appendix A

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
5000	Arkansas	0	0	All industry total	121,383	0.7%	.
11000	District of Columbia	0	0	All industry total	126,478	0.7%	.
31000	Nebraska	0	0	All industry total	117,446	0.6%	.
28000	Mississippi	0	0	All industry total	108,495	0.6%	.
35000	New Mexico	0	0	All industry total	93,594	0.5%	.
15000	Hawaii	0	0	All industry total	84,671	0.5%	.
54000	West Virginia	0	0	All industry total	72,861	0.4%	.
33000	New Hampshire	0	0	All industry total	77,208	0.4%	.
10000	Delaware	0	0	All industry total	71,453	0.4%	.
16000	Idaho	0	0	All industry total	68,377	0.4%	.
44000	Rhode Island	0	0	All industry total	57,529	0.3%	.
23000	Maine	0	0	All industry total	59,295	0.3%	.
38000	North Dakota	0	0	All industry total	53,453	0.3%	.
2000	Alaska	0	0	All industry total	50,404	0.3%	.
46000	South Dakota	0	0	All industry total	48,354	0.3%	.
30000	Montana	0	0	All industry total	46,227	0.3%	.
56000	Wyoming	0	0	All industry total	38,328	0.2%	.
50000	Vermont	0	0	All industry total	31,091	0.2%	.
0	United States	1	11, 21	Natural resources and mining	438,172	.	.
11000	District of Columbia	1	11, 21	Natural resources and mining	(L)	.	.
48000	Texas	1	11, 21	Natural resources and mining	122,577	28.0%	7.7%
6000	California	1	11, 21	Natural resources and mining	44,287	10.1%	1.7%
40000	Oklahoma	1	11, 21	Natural resources and mining	21,294	4.9%	11.7%
42000	Pennsylvania	1	11, 21	Natural resources and mining	19,393	4.4%	2.7%
8000	Colorado	1	11, 21	Natural resources and mining	12,616	2.9%	3.9%
22000	Louisiana	1	11, 21	Natural resources and mining	10,833	2.5%	4.6%
19000	Iowa	1	11, 21	Natural resources and mining	9,551	2.2%	5.2%
39000	Ohio	1	11, 21	Natural resources and mining	12,943	3.0%	2.1%
54000	West Virginia	1	11, 21	Natural resources and mining	8,701	2.0%	11.9%
2000	Alaska	1	11, 21	Natural resources and mining	8,161	1.9%	16.2%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
35000	New Mexico	1	11, 21	Natural resources and mining	8,539	1.9%	9.1%
38000	North Dakota	1	11, 21	Natural resources and mining	7,811	1.8%	14.6%
27000	Minnesota	1	11, 21	Natural resources and mining	8,742	2.0%	2.6%
17000	Illinois	1	11, 21	Natural resources and mining	8,224	1.9%	1.0%
56000	Wyoming	1	11, 21	Natural resources and mining	8,289	1.9%	21.6%
4000	Arizona	1	11, 21	Natural resources and mining	6,225	1.4%	2.0%
31000	Nebraska	1	11, 21	Natural resources and mining	7,417	1.7%	6.3%
53000	Washington	1	11, 21	Natural resources and mining	8,087	1.8%	1.7%
12000	Florida	1	11, 21	Natural resources and mining	7,660	1.7%	0.8%
18000	Indiana	1	11, 21	Natural resources and mining	5,923	1.4%	1.7%
55000	Wisconsin	1	11, 21	Natural resources and mining	6,572	1.5%	2.1%
5000	Arkansas	1	11, 21	Natural resources and mining	4,731	1.1%	3.9%
20000	Kansas	1	11, 21	Natural resources and mining	5,593	1.3%	3.7%
21000	Kentucky	1	11, 21	Natural resources and mining	5,435	1.2%	2.8%
37000	North Carolina	1	11, 21	Natural resources and mining	5,513	1.3%	1.1%
1000	Alabama	1	11, 21	Natural resources and mining	5,381	1.2%	2.6%
26000	Michigan	1	11, 21	Natural resources and mining	5,460	1.2%	1.1%
13000	Georgia	1	11, 21	Natural resources and mining	5,135	1.2%	1.0%
29000	Missouri	1	11, 21	Natural resources and mining	4,506	1.0%	1.5%
32000	Nevada	1	11, 21	Natural resources and mining	3,673	0.8%	2.5%
16000	Idaho	1	11, 21	Natural resources and mining	3,994	0.9%	5.8%
41000	Oregon	1	11, 21	Natural resources and mining	4,427	1.0%	1.9%
30000	Montana	1	11, 21	Natural resources and mining	3,263	0.7%	7.1%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
28000	Mississippi	1	11, 21	Natural resources and mining	3,180	0.7%	2.9%
49000	Utah	1	11, 21	Natural resources and mining	2,956	0.7%	1.9%
36000	New York	1	11, 21	Natural resources and mining	3,306	0.8%	0.2%
46000	South Dakota	1	11, 21	Natural resources and mining	3,664	0.8%	7.6%
51000	Virginia	1	11, 21	Natural resources and mining	3,432	0.8%	0.7%
47000	Tennessee	1	11, 21	Natural resources and mining	2,311	0.5%	0.7%
45000	South Carolina	1	11, 21	Natural resources and mining	1,383	0.3%	0.7%
24000	Maryland	1	11, 21	Natural resources and mining	1,133	0.3%	0.3%
34000	New Jersey	1	11, 21	Natural resources and mining	1,157	0.3%	0.2%
25000	Massachusetts	1	11, 21	Natural resources and mining	1,150	0.3%	0.2%
23000	Maine	1	11, 21	Natural resources and mining	949	0.2%	1.6%
10000	Delaware	1	11, 21	Natural resources and mining	458	0.1%	0.6%
50000	Vermont	1	11, 21	Natural resources and mining	606	0.1%	1.9%
9000	Connecticut	1	11, 21	Natural resources and mining	616	0.1%	0.2%
15000	Hawaii	1	11, 21	Natural resources and mining	480	0.1%	0.6%
33000	New Hampshire	1	11, 21	Natural resources and mining	268	0.1%	0.3%
44000	Rhode Island	1	11, 21	Natural resources and mining	167	0.0%	0.3%
0	United States	2	22	Utilities	287,088	.	.
48000	Texas	2	22	Utilities	34,891	12.2%	2.2%
6000	California	2	22	Utilities	28,751	10.0%	1.1%
36000	New York	2	22	Utilities	18,969	6.6%	1.3%
12000	Florida	2	22	Utilities	15,105	5.3%	1.6%
39000	Ohio	2	22	Utilities	11,441	4.0%	1.8%
17000	Illinois	2	22	Utilities	12,702	4.4%	1.6%
42000	Pennsylvania	2	22	Utilities	11,525	4.0%	1.6%
34000	New Jersey	2	22	Utilities	9,581	3.3%	1.7%
13000	Georgia	2	22	Utilities	9,319	3.2%	1.8%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
26000	Michigan	2	22	Utilities	8,592	3.0%	1.8%
37000	North Carolina	2	22	Utilities	8,073	2.8%	1.5%
24000	Maryland	2	22	Utilities	6,937	2.4%	1.8%
51000	Virginia	2	22	Utilities	6,089	2.1%	1.2%
1000	Alabama	2	22	Utilities	5,553	1.9%	2.7%
27000	Minnesota	2	22	Utilities	5,233	1.8%	1.5%
25000	Massachusetts	2	22	Utilities	5,625	2.0%	1.1%
18000	Indiana	2	22	Utilities	6,035	2.1%	1.7%
4000	Arizona	2	22	Utilities	5,883	2.0%	1.9%
29000	Missouri	2	22	Utilities	5,310	1.9%	1.8%
55000	Wisconsin	2	22	Utilities	4,883	1.7%	1.6%
40000	Oklahoma	2	22	Utilities	4,392	1.5%	2.4%
45000	South Carolina	2	22	Utilities	4,609	1.6%	2.2%
9000	Connecticut	2	22	Utilities	4,213	1.5%	1.6%
8000	Colorado	2	22	Utilities	4,088	1.4%	1.3%
22000	Louisiana	2	22	Utilities	3,849	1.3%	1.6%
53000	Washington	2	22	Utilities	3,618	1.3%	0.8%
41000	Oregon	2	22	Utilities	3,504	1.2%	1.5%
28000	Mississippi	2	22	Utilities	3,061	1.1%	2.8%
5000	Arkansas	2	22	Utilities	2,981	1.0%	2.5%
21000	Kentucky	2	22	Utilities	2,877	1.0%	1.5%
19000	Iowa	2	22	Utilities	2,997	1.0%	1.6%
20000	Kansas	2	22	Utilities	2,347	0.8%	1.6%
31000	Nebraska	2	22	Utilities	2,576	0.9%	2.2%
54000	West Virginia	2	22	Utilities	1,990	0.7%	2.7%
32000	Nevada	2	22	Utilities	1,982	0.7%	1.4%
47000	Tennessee	2	22	Utilities	1,848	0.6%	0.6%
15000	Hawaii	2	22	Utilities	1,443	0.5%	1.7%
49000	Utah	2	22	Utilities	1,670	0.6%	1.1%
38000	North Dakota	2	22	Utilities	1,440	0.5%	2.7%
35000	New Mexico	2	22	Utilities	1,383	0.5%	1.5%
11000	District of Columbia	2	22	Utilities	1,257	0.4%	1.0%
30000	Montana	2	22	Utilities	967	0.3%	2.1%
16000	Idaho	2	22	Utilities	966	0.3%	1.4%
33000	New Hampshire	2	22	Utilities	933	0.3%	1.2%
23000	Maine	2	22	Utilities	965	0.3%	1.6%
46000	South Dakota	2	22	Utilities	801	0.3%	1.7%
56000	Wyoming	2	22	Utilities	930	0.3%	2.4%
10000	Delaware	2	22	Utilities	938	0.3%	1.3%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
2000	Alaska	2	22	Utilities	737	0.3%	1.5%
50000	Vermont	2	22	Utilities	579	0.2%	1.9%
44000	Rhode Island	2	22	Utilities	649	0.2%	1.1%
0	United States	3	23	Construction	792,509	.	.
6000	California	3	23	Construction	101,658	12.8%	3.9%
48000	Texas	3	23	Construction	91,279	11.5%	5.7%
36000	New York	3	23	Construction	49,534	6.3%	3.3%
12000	Florida	3	23	Construction	48,053	6.1%	5.2%
42000	Pennsylvania	3	23	Construction	31,668	4.0%	4.4%
17000	Illinois	3	23	Construction	30,691	3.9%	3.9%
34000	New Jersey	3	23	Construction	23,207	2.9%	4.0%
39000	Ohio	3	23	Construction	23,604	3.0%	3.8%
51000	Virginia	3	23	Construction	21,021	2.7%	4.3%
25000	Massachusetts	3	23	Construction	19,611	2.5%	3.9%
13000	Georgia	3	23	Construction	22,327	2.8%	4.2%
53000	Washington	3	23	Construction	20,666	2.6%	4.3%
37000	North Carolina	3	23	Construction	19,775	2.5%	3.8%
26000	Michigan	3	23	Construction	20,121	2.5%	4.1%
24000	Maryland	3	23	Construction	18,298	2.3%	4.8%
8000	Colorado	3	23	Construction	19,063	2.4%	5.9%
27000	Minnesota	3	23	Construction	14,319	1.8%	4.2%
22000	Louisiana	3	23	Construction	12,958	1.6%	5.5%
18000	Indiana	3	23	Construction	13,284	1.7%	3.8%
47000	Tennessee	3	23	Construction	12,874	1.6%	3.9%
55000	Wisconsin	3	23	Construction	13,016	1.6%	4.2%
4000	Arizona	3	23	Construction	13,500	1.7%	4.4%
29000	Missouri	3	23	Construction	11,226	1.4%	3.8%
45000	South Carolina	3	23	Construction	10,854	1.4%	5.2%
40000	Oklahoma	3	23	Construction	7,777	1.0%	4.3%
9000	Connecticut	3	23	Construction	8,301	1.0%	3.2%
49000	Utah	3	23	Construction	9,851	1.2%	6.2%
21000	Kentucky	3	23	Construction	8,585	1.1%	4.4%
1000	Alabama	3	23	Construction	7,733	1.0%	3.8%
19000	Iowa	3	23	Construction	8,492	1.1%	4.6%
41000	Oregon	3	23	Construction	9,350	1.2%	4.1%
32000	Nevada	3	23	Construction	7,480	0.9%	5.1%
20000	Kansas	3	23	Construction	6,203	0.8%	4.1%
5000	Arkansas	3	23	Construction	4,749	0.6%	3.9%
15000	Hawaii	3	23	Construction	5,591	0.7%	6.6%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
28000	Mississippi	3	23	Construction	4,455	0.6%	4.1%
38000	North Dakota	3	23	Construction	4,077	0.5%	7.6%
31000	Nebraska	3	23	Construction	4,052	0.5%	3.5%
54000	West Virginia	3	23	Construction	3,793	0.5%	5.2%
35000	New Mexico	3	23	Construction	3,539	0.4%	3.8%
16000	Idaho	3	23	Construction	4,066	0.5%	5.9%
30000	Montana	3	23	Construction	2,847	0.4%	6.2%
33000	New Hampshire	3	23	Construction	2,556	0.3%	3.3%
2000	Alaska	3	23	Construction	2,139	0.3%	4.2%
56000	Wyoming	3	23	Construction	2,109	0.3%	5.5%
44000	Rhode Island	3	23	Construction	2,324	0.3%	4.0%
10000	Delaware	3	23	Construction	2,658	0.3%	3.7%
23000	Maine	3	23	Construction	2,334	0.3%	3.9%
46000	South Dakota	3	23	Construction	2,069	0.3%	4.3%
11000	District of Columbia	3	23	Construction	1,608	0.2%	1.3%
50000	Vermont	3	23	Construction	1,163	0.1%	3.7%
0	United States	4	31-33	Manufacturing	2,182,952	.	.
6000	California	4	31-33	Manufacturing	291,558	13.4%	11.1%
48000	Texas	4	31-33	Manufacturing	218,275	10.0%	13.6%
39000	Ohio	4	31-33	Manufacturing	105,880	4.9%	16.9%
17000	Illinois	4	31-33	Manufacturing	99,874	4.6%	12.5%
37000	North Carolina	4	31-33	Manufacturing	103,407	4.7%	19.8%
18000	Indiana	4	31-33	Manufacturing	99,825	4.6%	28.7%
26000	Michigan	4	31-33	Manufacturing	92,921	4.3%	19.0%
42000	Pennsylvania	4	31-33	Manufacturing	84,519	3.9%	11.7%
36000	New York	4	31-33	Manufacturing	72,149	3.3%	4.8%
53000	Washington	4	31-33	Manufacturing	59,935	2.7%	12.6%
55000	Wisconsin	4	31-33	Manufacturing	56,435	2.6%	18.0%
13000	Georgia	4	31-33	Manufacturing	57,296	2.6%	10.8%
22000	Louisiana	4	31-33	Manufacturing	49,115	2.3%	20.7%
47000	Tennessee	4	31-33	Manufacturing	54,078	2.5%	16.3%
41000	Oregon	4	31-33	Manufacturing	49,605	2.3%	21.7%
27000	Minnesota	4	31-33	Manufacturing	48,922	2.2%	14.4%
25000	Massachusetts	4	31-33	Manufacturing	48,336	2.2%	9.6%
12000	Florida	4	31-33	Manufacturing	47,437	2.2%	5.1%
34000	New Jersey	4	31-33	Manufacturing	45,902	2.1%	8.0%
51000	Virginia	4	31-33	Manufacturing	42,778	2.0%	8.7%
29000	Missouri	4	31-33	Manufacturing	40,530	1.9%	13.6%

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Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
21000	Kentucky	4	31-33	Manufacturing	37,301	1.7%	19.0%
1000	Alabama	4	31-33	Manufacturing	35,761	1.6%	17.4%
45000	South Carolina	4	31-33	Manufacturing	35,339	1.6%	16.8%
19000	Iowa	4	31-33	Manufacturing	34,024	1.6%	18.4%
9000	Connecticut	4	31-33	Manufacturing	28,273	1.3%	10.9%
4000	Arizona	4	31-33	Manufacturing	25,288	1.2%	8.3%
8000	Colorado	4	31-33	Manufacturing	22,628	1.0%	7.0%
20000	Kansas	4	31-33	Manufacturing	22,737	1.0%	15.1%
24000	Maryland	4	31-33	Manufacturing	21,150	1.0%	5.5%
5000	Arkansas	4	31-33	Manufacturing	17,800	0.8%	14.7%
40000	Oklahoma	4	31-33	Manufacturing	17,249	0.8%	9.5%
49000	Utah	4	31-33	Manufacturing	17,737	0.8%	11.2%
28000	Mississippi	4	31-33	Manufacturing	17,354	0.8%	16.0%
31000	Nebraska	4	31-33	Manufacturing	12,890	0.6%	11.0%
33000	New Hampshire	4	31-33	Manufacturing	8,362	0.4%	10.8%
54000	West Virginia	4	31-33	Manufacturing	7,500	0.3%	10.3%
16000	Idaho	4	31-33	Manufacturing	7,724	0.4%	11.3%
32000	Nevada	4	31-33	Manufacturing	6,157	0.3%	4.2%
23000	Maine	4	31-33	Manufacturing	5,371	0.2%	9.1%
10000	Delaware	4	31-33	Manufacturing	4,191	0.2%	5.9%
44000	Rhode Island	4	31-33	Manufacturing	4,641	0.2%	8.1%
46000	South Dakota	4	31-33	Manufacturing	4,455	0.2%	9.2%
35000	New Mexico	4	31-33	Manufacturing	3,985	0.2%	4.3%
38000	North Dakota	4	31-33	Manufacturing	3,765	0.2%	7.0%
30000	Montana	4	31-33	Manufacturing	3,525	0.2%	7.6%
50000	Vermont	4	31-33	Manufacturing	2,834	0.1%	9.1%
56000	Wyoming	4	31-33	Manufacturing	2,479	0.1%	6.5%
2000	Alaska	4	31-33	Manufacturing	1,574	0.1%	3.1%
15000	Hawaii	4	31-33	Manufacturing	1,817	0.1%	2.1%
11000	District of Columbia	4	31-33	Manufacturing	266	0.0%	0.2%
0	United States	5	42, 44-45	Trade	2,199,500	.	.
6000	California	5	42, 44-45	Trade	289,021	13.1%	11.0%
48000	Texas	5	42, 44-45	Trade	223,733	10.2%	14.0%
36000	New York	5	42, 44-45	Trade	143,278	6.5%	9.6%
12000	Florida	5	42, 44-45	Trade	132,522	6.0%	14.3%
17000	Illinois	5	42, 44-45	Trade	101,312	4.6%	12.7%
34000	New Jersey	5	42, 44-45	Trade	81,241	3.7%	14.1%
42000	Pennsylvania	5	42, 44-45	Trade	77,559	3.5%	10.8%
39000	Ohio	5	42, 44-45	Trade	76,228	3.5%	12.2%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
13000	Georgia	5	42, 44-45	Trade	72,112	3.3%	13.6%
26000	Michigan	5	42, 44-45	Trade	63,428	2.9%	12.9%
53000	Washington	5	42, 44-45	Trade	63,831	2.9%	13.4%
37000	North Carolina	5	42, 44-45	Trade	57,697	2.6%	11.1%
51000	Virginia	5	42, 44-45	Trade	46,419	2.1%	9.4%
25000	Massachusetts	5	42, 44-45	Trade	46,957	2.1%	9.3%
47000	Tennessee	5	42, 44-45	Trade	46,553	2.1%	14.0%
27000	Minnesota	5	42, 44-45	Trade	41,937	1.9%	12.4%
4000	Arizona	5	42, 44-45	Trade	41,298	1.9%	13.5%
18000	Indiana	5	42, 44-45	Trade	39,708	1.8%	11.4%
29000	Missouri	5	42, 44-45	Trade	37,897	1.7%	12.7%
55000	Wisconsin	5	42, 44-45	Trade	36,878	1.7%	11.8%
8000	Colorado	5	42, 44-45	Trade	37,154	1.7%	11.5%
24000	Maryland	5	42, 44-45	Trade	36,064	1.6%	9.4%
9000	Connecticut	5	42, 44-45	Trade	31,111	1.4%	12.0%
22000	Louisiana	5	42, 44-45	Trade	27,890	1.3%	11.8%
45000	South Carolina	5	42, 44-45	Trade	26,978	1.2%	12.9%
1000	Alabama	5	42, 44-45	Trade	26,122	1.2%	12.7%
21000	Kentucky	5	42, 44-45	Trade	25,210	1.1%	12.8%
40000	Oklahoma	5	42, 44-45	Trade	21,751	1.0%	12.0%
41000	Oregon	5	42, 44-45	Trade	23,043	1.0%	10.1%
19000	Iowa	5	42, 44-45	Trade	20,167	0.9%	10.9%
20000	Kansas	5	42, 44-45	Trade	20,308	0.9%	13.5%
49000	Utah	5	42, 44-45	Trade	19,539	0.9%	12.4%
5000	Arkansas	5	42, 44-45	Trade	17,915	0.8%	14.8%
32000	Nevada	5	42, 44-45	Trade	16,419	0.7%	11.2%
28000	Mississippi	5	42, 44-45	Trade	14,852	0.7%	13.7%
31000	Nebraska	5	42, 44-45	Trade	14,137	0.6%	12.0%
33000	New Hampshire	5	42, 44-45	Trade	10,576	0.5%	13.7%
16000	Idaho	5	42, 44-45	Trade	9,903	0.5%	14.5%
35000	New Mexico	5	42, 44-45	Trade	8,876	0.4%	9.5%
54000	West Virginia	5	42, 44-45	Trade	8,440	0.4%	11.6%
23000	Maine	5	42, 44-45	Trade	8,394	0.4%	14.2%
38000	North Dakota	5	42, 44-45	Trade	7,707	0.4%	14.4%
15000	Hawaii	5	42, 44-45	Trade	8,327	0.4%	9.8%
46000	South Dakota	5	42, 44-45	Trade	7,220	0.3%	14.9%
44000	Rhode Island	5	42, 44-45	Trade	6,586	0.3%	11.4%
30000	Montana	5	42, 44-45	Trade	5,742	0.3%	12.4%
10000	Delaware	5	42, 44-45	Trade	5,187	0.2%	7.3%
50000	Vermont	5	42, 44-45	Trade	4,077	0.2%	13.1%

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Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
56000	Wyoming	5	42, 44-45	Trade	3,802	0.2%	9.9%
2000	Alaska	5	42, 44-45	Trade	3,616	0.2%	7.2%
11000	District of Columbia	5	42, 44-45	Trade	2,779	0.1%	2.2%
0	United States	6	51-56, 61-62, 71-72, 81	Services	9,761,896	.	.
6000	California	6	51-56, 61-62, 71-72, 81	Services	1,483,489	15.2%	56.6%
36000	New York	6	51-56, 61-62, 71-72, 81	Services	1,020,172	10.5%	68.0%
48000	Texas	6	51-56, 61-62, 71-72, 81	Services	674,834	6.9%	42.2%
12000	Florida	6	51-56, 61-62, 71-72, 81	Services	536,658	5.5%	58.0%
17000	Illinois	6	51-56, 61-62, 71-72, 81	Services	437,296	4.5%	54.9%
42000	Pennsylvania	6	51-56, 61-62, 71-72, 81	Services	400,609	4.1%	55.7%
34000	New Jersey	6	51-56, 61-62, 71-72, 81	Services	331,691	3.4%	57.7%
25000	Massachusetts	6	51-56, 61-62, 71-72, 81	Services	321,260	3.3%	63.5%
39000	Ohio	6	51-56, 61-62, 71-72, 81	Services	307,404	3.1%	49.1%
51000	Virginia	6	51-56, 61-62, 71-72, 81	Services	267,873	2.7%	54.3%
13000	Georgia	6	51-56, 61-62, 71-72, 81	Services	278,488	2.9%	52.4%
37000	North Carolina	6	51-56, 61-62, 71-72, 81	Services	246,133	2.5%	47.2%
53000	Washington	6	51-56, 61-62, 71-72, 81	Services	242,717	2.5%	50.9%
26000	Michigan	6	51-56, 61-62, 71-72, 81	Services	234,382	2.4%	47.8%
24000	Maryland	6	51-56, 61-62, 71-72, 81	Services	211,586	2.2%	55.3%
8000	Colorado	6	51-56, 61-62, 71-72, 81	Services	176,379	1.8%	54.7%
27000	Minnesota	6	51-56, 61-62, 71-72, 81	Services	175,584	1.8%	51.8%
9000	Connecticut	6	51-56, 61-62, 71-72, 81	Services	155,759	1.6%	59.9%
4000	Arizona	6	51-56, 61-62, 71-72, 81	Services	163,652	1.7%	53.5%
47000	Tennessee	6	51-56, 61-62, 71-72, 81	Services	160,943	1.6%	48.5%

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29000	Missouri	6	51-56, 61-62, 71-72, 81	Services	153,417	1.6%	51.3%
55000	Wisconsin	6	51-56, 61-62, 71-72, 81	Services	152,037	1.6%	48.6%
18000	Indiana	6	51-56, 61-62, 71-72, 81	Services	139,401	1.4%	40.1%
41000	Oregon	6	51-56, 61-62, 71-72, 81	Services	106,528	1.1%	46.5%
22000	Louisiana	6	51-56, 61-62, 71-72, 81	Services	95,433	1.0%	40.3%
45000	South Carolina	6	51-56, 61-62, 71-72, 81	Services	92,824	1.0%	44.2%
1000	Alabama	6	51-56, 61-62, 71-72, 81	Services	84,997	0.9%	41.3%
32000	Nevada	6	51-56, 61-62, 71-72, 81	Services	87,476	0.9%	59.8%
21000	Kentucky	6	51-56, 61-62, 71-72, 81	Services	80,183	0.8%	40.8%
19000	Iowa	6	51-56, 61-62, 71-72, 81	Services	83,156	0.9%	44.9%
11000	District of Columbia	6	51-56, 61-62, 71-72, 81	Services	77,154	0.8%	61.0%
49000	Utah	6	51-56, 61-62, 71-72, 81	Services	80,223	0.8%	50.9%
40000	Oklahoma	6	51-56, 61-62, 71-72, 81	Services	69,860	0.7%	38.5%
20000	Kansas	6	51-56, 61-62, 71-72, 81	Services	66,779	0.7%	44.3%
5000	Arkansas	6	51-56, 61-62, 71-72, 81	Services	52,401	0.5%	43.2%
31000	Nebraska	6	51-56, 61-62, 71-72, 81	Services	52,788	0.5%	44.9%
10000	Delaware	6	51-56, 61-62, 71-72, 81	Services	50,022	0.5%	70.0%
15000	Hawaii	6	51-56, 61-62, 71-72, 81	Services	45,360	0.5%	53.6%
28000	Mississippi	6	51-56, 61-62, 71-72, 81	Services	42,806	0.4%	39.5%
33000	New Hampshire	6	51-56, 61-62, 71-72, 81	Services	44,528	0.5%	57.7%
35000	New Mexico	6	51-56, 61-62, 71-72, 81	Services	42,489	0.4%	45.4%
44000	Rhode Island	6	51-56, 61-62, 71-72, 81	Services	34,351	0.4%	59.7%
23000	Maine	6	51-56, 61-62, 71-72, 81	Services	31,601	0.3%	53.3%

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16000	Idaho	6	51-56, 61-62, 71-72, 81	Services	30,337	0.3%	44.4%
54000	West Virginia	6	51-56, 61-62, 71-72, 81	Services	28,478	0.3%	39.1%
46000	South Dakota	6	51-56, 61-62, 71-72, 81	Services	23,414	0.2%	48.4%
30000	Montana	6	51-56, 61-62, 71-72, 81	Services	20,914	0.2%	45.2%
38000	North Dakota	6	51-56, 61-62, 71-72, 81	Services	19,946	0.2%	37.3%
2000	Alaska	6	51-56, 61-62, 71-72, 81	Services	17,698	0.2%	35.1%
50000	Vermont	6	51-56, 61-62, 71-72, 81	Services	16,645	0.2%	53.5%
56000	Wyoming	6	51-56, 61-62, 71-72, 81	Services	11,735	0.1%	30.6%
0	United States	7	51	Information	903,994	.	.
6000	California	7	51	Information	222,726	24.6%	8.5%
36000	New York	7	51	Information	121,479	13.4%	8.1%
48000	Texas	7	51	Information	55,259	6.1%	3.5%
53000	Washington	7	51	Information	50,525	5.6%	10.6%
12000	Florida	7	51	Information	36,531	4.0%	3.9%
42000	Pennsylvania	7	51	Information	47,430	5.2%	6.6%
13000	Georgia	7	51	Information	40,893	4.5%	7.7%
17000	Illinois	7	51	Information	26,332	2.9%	3.3%
25000	Massachusetts	7	51	Information	26,988	3.0%	5.3%
34000	New Jersey	7	51	Information	22,412	2.5%	3.9%
8000	Colorado	7	51	Information	17,269	1.9%	5.4%
51000	Virginia	7	51	Information	15,346	1.7%	3.1%
37000	North Carolina	7	51	Information	17,523	1.9%	3.4%
39000	Ohio	7	51	Information	16,549	1.8%	2.6%
24000	Maryland	7	51	Information	16,655	1.8%	4.4%
27000	Minnesota	7	51	Information	11,633	1.3%	3.4%
29000	Missouri	7	51	Information	10,637	1.2%	3.6%
9000	Connecticut	7	51	Information	13,126	1.5%	5.1%
26000	Michigan	7	51	Information	12,300	1.4%	2.5%
55000	Wisconsin	7	51	Information	10,367	1.1%	3.3%
47000	Tennessee	7	51	Information	9,497	1.1%	2.9%
4000	Arizona	7	51	Information	9,531	1.1%	3.1%
41000	Oregon	7	51	Information	7,071	0.8%	3.1%
18000	Indiana	7	51	Information	6,178	0.7%	1.8%

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11000	District of Columbia	7	51	Information	6,167	0.7%	4.9%
49000	Utah	7	51	Information	7,139	0.8%	4.5%
5000	Arkansas	7	51	Information	3,999	0.4%	3.3%
20000	Kansas	7	51	Information	4,008	0.4%	2.7%
22000	Louisiana	7	51	Information	5,635	0.6%	2.4%
45000	South Carolina	7	51	Information	5,118	0.6%	2.4%
21000	Kentucky	7	51	Information	4,240	0.5%	2.2%
1000	Alabama	7	51	Information	4,393	0.5%	2.1%
19000	Iowa	7	51	Information	3,948	0.4%	2.1%
40000	Oklahoma	7	51	Information	4,554	0.5%	2.5%
35000	New Mexico	7	51	Information	3,545	0.4%	3.8%
32000	Nevada	7	51	Information	3,724	0.4%	2.5%
44000	Rhode Island	7	51	Information	1,615	0.2%	2.8%
31000	Nebraska	7	51	Information	3,110	0.3%	2.6%
33000	New Hampshire	7	51	Information	3,074	0.3%	4.0%
28000	Mississippi	7	51	Information	2,146	0.2%	2.0%
10000	Delaware	7	51	Information	1,077	0.1%	1.5%
15000	Hawaii	7	51	Information	1,889	0.2%	2.2%
54000	West Virginia	7	51	Information	1,566	0.2%	2.1%
2000	Alaska	7	51	Information	1,405	0.2%	2.8%
16000	Idaho	7	51	Information	1,363	0.2%	2.0%
46000	South Dakota	7	51	Information	1,133	0.1%	2.3%
38000	North Dakota	7	51	Information	1,289	0.1%	2.4%
23000	Maine	7	51	Information	1,150	0.1%	1.9%
30000	Montana	7	51	Information	1,008	0.1%	2.2%
50000	Vermont	7	51	Information	841	0.1%	2.7%
56000	Wyoming	7	51	Information	598	0.1%	1.6%
0	United States	8	52, 53	Finance, insurance, real estate, rental, and leasing	3,883,755	.	.
6000	California	8	52, 53	Finance, insurance, real estate, rental, and leasing	571,712	14.7%	21.8%
36000	New York	8	52, 53	Finance, insurance, real estate, rental, and leasing	481,839	12.4%	32.1%
48000	Texas	8	52, 53	Finance, insurance, real estate, rental, and leasing	243,355	6.3%	15.2%
12000	Florida	8	52, 53	Finance, insurance, real estate, rental, and leasing	210,522	5.4%	22.7%

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17000	Illinois	8	52, 53	Finance, insurance, real estate, rental, and leasing	187,802	4.8%	23.6%
34000	New Jersey	8	52, 53	Finance, insurance, real estate, rental, and leasing	137,524	3.5%	23.9%
42000	Pennsylvania	8	52, 53	Finance, insurance, real estate, rental, and leasing	136,324	3.5%	18.9%
39000	Ohio	8	52, 53	Finance, insurance, real estate, rental, and leasing	127,276	3.3%	20.3%
25000	Massachusetts	8	52, 53	Finance, insurance, real estate, rental, and leasing	120,150	3.1%	23.8%
37000	North Carolina	8	52, 53	Finance, insurance, real estate, rental, and leasing	100,687	2.6%	19.3%
13000	Georgia	8	52, 53	Finance, insurance, real estate, rental, and leasing	106,450	2.7%	20.0%
51000	Virginia	8	52, 53	Finance, insurance, real estate, rental, and leasing	98,018	2.5%	19.9%
24000	Maryland	8	52, 53	Finance, insurance, real estate, rental, and leasing	87,009	2.2%	22.8%
26000	Michigan	8	52, 53	Finance, insurance, real estate, rental, and leasing	86,734	2.2%	17.7%
53000	Washington	8	52, 53	Finance, insurance, real estate, rental, and leasing	83,468	2.1%	17.5%
9000	Connecticut	8	52, 53	Finance, insurance, real estate, rental, and leasing	71,540	1.8%	27.5%
27000	Minnesota	8	52, 53	Finance, insurance, real estate, rental, and leasing	66,458	1.7%	19.6%
4000	Arizona	8	52, 53	Finance, insurance, real estate, rental, and leasing	70,046	1.8%	22.9%
8000	Colorado	8	52, 53	Finance, insurance, real estate, rental, and leasing	65,878	1.7%	20.4%
55000	Wisconsin	8	52, 53	Finance, insurance, real estate, rental, and leasing	65,656	1.7%	21.0%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
29000	Missouri	8	52, 53	Finance, insurance, real estate, rental, and leasing	57,687	1.5%	19.3%
47000	Tennessee	8	52, 53	Finance, insurance, real estate, rental, and leasing	54,692	1.4%	16.5%
18000	Indiana	8	52, 53	Finance, insurance, real estate, rental, and leasing	54,610	1.4%	15.7%
41000	Oregon	8	52, 53	Finance, insurance, real estate, rental, and leasing	41,911	1.1%	18.3%
19000	Iowa	8	52, 53	Finance, insurance, real estate, rental, and leasing	44,713	1.2%	24.1%
22000	Louisiana	8	52, 53	Finance, insurance, real estate, rental, and leasing	33,983	0.9%	14.3%
45000	South Carolina	8	52, 53	Finance, insurance, real estate, rental, and leasing	36,014	0.9%	17.2%
1000	Alabama	8	52, 53	Finance, insurance, real estate, rental, and leasing	33,677	0.9%	16.4%
49000	Utah	8	52, 53	Finance, insurance, real estate, rental, and leasing	35,166	0.9%	22.3%
21000	Kentucky	8	52, 53	Finance, insurance, real estate, rental, and leasing	30,866	0.8%	15.7%
10000	Delaware	8	52, 53	Finance, insurance, real estate, rental, and leasing	32,801	0.8%	45.9%
32000	Nevada	8	52, 53	Finance, insurance, real estate, rental, and leasing	30,548	0.8%	20.9%
40000	Oklahoma	8	52, 53	Finance, insurance, real estate, rental, and leasing	25,513	0.7%	14.1%
20000	Kansas	8	52, 53	Finance, insurance, real estate, rental, and leasing	25,706	0.7%	17.1%
31000	Nebraska	8	52, 53	Finance, insurance, real estate, rental, and leasing	24,240	0.6%	20.6%
15000	Hawaii	8	52, 53	Finance, insurance, real estate, rental, and leasing	19,638	0.5%	23.2%

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Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
5000	Arkansas	8	52, 53	Finance, insurance, real estate, rental, and leasing	18,611	0.5%	15.3%
33000	New Hampshire	8	52, 53	Finance, insurance, real estate, rental, and leasing	18,714	0.5%	24.2%
11000	District of Columbia	8	52, 53	Finance, insurance, real estate, rental, and leasing	17,374	0.4%	13.7%
28000	Mississippi	8	52, 53	Finance, insurance, real estate, rental, and leasing	16,321	0.4%	15.0%
35000	New Mexico	8	52, 53	Finance, insurance, real estate, rental, and leasing	15,932	0.4%	17.0%
44000	Rhode Island	8	52, 53	Finance, insurance, real estate, rental, and leasing	14,339	0.4%	24.9%
16000	Idaho	8	52, 53	Finance, insurance, real estate, rental, and leasing	12,405	0.3%	18.1%
46000	South Dakota	8	52, 53	Finance, insurance, real estate, rental, and leasing	11,882	0.3%	24.6%
23000	Maine	8	52, 53	Finance, insurance, real estate, rental, and leasing	12,360	0.3%	20.8%
54000	West Virginia	8	52, 53	Finance, insurance, real estate, rental, and leasing	9,843	0.3%	13.5%
30000	Montana	8	52, 53	Finance, insurance, real estate, rental, and leasing	8,486	0.2%	18.4%
38000	North Dakota	8	52, 53	Finance, insurance, real estate, rental, and leasing	9,072	0.2%	17.0%
2000	Alaska	8	52, 53	Finance, insurance, real estate, rental, and leasing	6,459	0.2%	12.8%
50000	Vermont	8	52, 53	Finance, insurance, real estate, rental, and leasing	6,132	0.2%	19.7%
56000	Wyoming	8	52, 53	Finance, insurance, real estate, rental, and leasing	5,614	0.1%	14.6%
0	United States	9	54, 55, 56	Professional and business services	2,251,679	.	.
6000	California	9	54, 55, 56	Professional and business services	333,821	14.8%	12.7%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
36000	New York	9	54, 55, 56	Professional and business services	191,971	8.5%	12.8%
48000	Texas	9	54, 55, 56	Professional and business services	179,358	8.0%	11.2%
12000	Florida	9	54, 55, 56	Professional and business services	118,526	5.3%	12.8%
17000	Illinois	9	54, 55, 56	Professional and business services	106,845	4.7%	13.4%
42000	Pennsylvania	9	54, 55, 56	Professional and business services	92,499	4.1%	12.9%
34000	New Jersey	9	54, 55, 56	Professional and business services	90,384	4.0%	15.7%
51000	Virginia	9	54, 55, 56	Professional and business services	90,656	4.0%	18.4%
25000	Massachusetts	9	54, 55, 56	Professional and business services	83,831	3.7%	16.6%
39000	Ohio	9	54, 55, 56	Professional and business services	71,527	3.2%	11.4%
13000	Georgia	9	54, 55, 56	Professional and business services	64,463	2.9%	12.1%
26000	Michigan	9	54, 55, 56	Professional and business services	63,490	2.8%	13.0%
37000	North Carolina	9	54, 55, 56	Professional and business services	58,651	2.6%	11.2%
24000	Maryland	9	54, 55, 56	Professional and business services	51,969	2.3%	13.6%
53000	Washington	9	54, 55, 56	Professional and business services	49,893	2.2%	10.5%
8000	Colorado	9	54, 55, 56	Professional and business services	46,041	2.0%	14.3%
27000	Minnesota	9	54, 55, 56	Professional and business services	43,892	1.9%	12.9%
47000	Tennessee	9	54, 55, 56	Professional and business services	37,011	1.6%	11.2%
29000	Missouri	9	54, 55, 56	Professional and business services	37,179	1.7%	12.4%
4000	Arizona	9	54, 55, 56	Professional and business services	34,798	1.5%	11.4%
9000	Connecticut	9	54, 55, 56	Professional and business services	31,387	1.4%	12.1%
11000	District of Columbia	9	54, 55, 56	Professional and business services	30,656	1.4%	24.2%
55000	Wisconsin	9	54, 55, 56	Professional and business services	29,880	1.3%	9.5%
18000	Indiana	9	54, 55, 56	Professional and business services	28,283	1.3%	8.1%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
41000	Oregon	9	54, 55, 56	Professional and business services	24,577	1.1%	10.7%
45000	South Carolina	9	54, 55, 56	Professional and business services	21,428	1.0%	10.2%
22000	Louisiana	9	54, 55, 56	Professional and business services	20,131	0.9%	8.5%
1000	Alabama	9	54, 55, 56	Professional and business services	19,202	0.9%	9.3%
49000	Utah	9	54, 55, 56	Professional and business services	17,197	0.8%	10.9%
21000	Kentucky	9	54, 55, 56	Professional and business services	16,410	0.7%	8.3%
40000	Oklahoma	9	54, 55, 56	Professional and business services	15,290	0.7%	8.4%
32000	Nevada	9	54, 55, 56	Professional and business services	15,674	0.7%	10.7%
20000	Kansas	9	54, 55, 56	Professional and business services	16,562	0.7%	11.0%
5000	Arkansas	9	54, 55, 56	Professional and business services	12,427	0.6%	10.2%
19000	Iowa	9	54, 55, 56	Professional and business services	11,531	0.5%	6.2%
31000	Nebraska	9	54, 55, 56	Professional and business services	10,573	0.5%	9.0%
35000	New Mexico	9	54, 55, 56	Professional and business services	9,646	0.4%	10.3%
33000	New Hampshire	9	54, 55, 56	Professional and business services	9,197	0.4%	11.9%
28000	Mississippi	9	54, 55, 56	Professional and business services	7,752	0.3%	7.1%
10000	Delaware	9	54, 55, 56	Professional and business services	7,727	0.3%	10.8%
15000	Hawaii	9	54, 55, 56	Professional and business services	7,364	0.3%	8.7%
44000	Rhode Island	9	54, 55, 56	Professional and business services	6,934	0.3%	12.1%
16000	Idaho	9	54, 55, 56	Professional and business services	6,623	0.3%	9.7%
23000	Maine	9	54, 55, 56	Professional and business services	6,007	0.3%	10.1%
54000	West Virginia	9	54, 55, 56	Professional and business services	5,183	0.2%	7.1%
2000	Alaska	9	54, 55, 56	Professional and business services	3,309	0.1%	6.6%
30000	Montana	9	54, 55, 56	Professional and business services	3,371	0.2%	7.3%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
38000	North Dakota	9	54, 55, 56	Professional and business services	3,118	0.1%	5.8%
50000	Vermont	9	54, 55, 56	Professional and business services	3,015	0.1%	9.7%
46000	South Dakota	9	54, 55, 56	Professional and business services	2,767	0.1%	5.7%
56000	Wyoming	9	54, 55, 56	Professional and business services	1,650	0.1%	4.3%
0	United States	10	61, 62	Educational services, health care, and social assistance	1,555,640	.	.
6000	California	10	61, 62	Educational services, health care, and social assistance	186,813	12.0%	7.1%
36000	New York	10	61, 62	Educational services, health care, and social assistance	133,398	8.6%	8.9%
48000	Texas	10	61, 62	Educational services, health care, and social assistance	104,815	6.7%	6.6%
12000	Florida	10	61, 62	Educational services, health care, and social assistance	86,911	5.6%	9.4%
42000	Pennsylvania	10	61, 62	Educational services, health care, and social assistance	83,051	5.3%	11.5%
17000	Illinois	10	61, 62	Educational services, health care, and social assistance	66,559	4.3%	8.4%
25000	Massachusetts	10	61, 62	Educational services, health care, and social assistance	60,704	3.9%	12.0%
39000	Ohio	10	61, 62	Educational services, health care, and social assistance	57,499	3.7%	9.2%
34000	New Jersey	10	61, 62	Educational services, health care, and social assistance	50,645	3.3%	8.8%

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Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
26000	Michigan	10	61, 62	Educational services, health care, and social assistance	43,413	2.8%	8.9%
37000	North Carolina	10	61, 62	Educational services, health care, and social assistance	39,833	2.6%	7.6%
13000	Georgia	10	61, 62	Educational services, health care, and social assistance	38,746	2.5%	7.3%
27000	Minnesota	10	61, 62	Educational services, health care, and social assistance	34,893	2.2%	10.3%
51000	Virginia	10	61, 62	Educational services, health care, and social assistance	34,956	2.2%	7.1%
47000	Tennessee	10	61, 62	Educational services, health care, and social assistance	34,920	2.2%	10.5%
24000	Maryland	10	61, 62	Educational services, health care, and social assistance	33,144	2.1%	8.7%
53000	Washington	10	61, 62	Educational services, health care, and social assistance	32,333	2.1%	6.8%
55000	Wisconsin	10	61, 62	Educational services, health care, and social assistance	29,743	1.9%	9.5%
18000	Indiana	10	61, 62	Educational services, health care, and social assistance	30,526	2.0%	8.8%
29000	Missouri	10	61, 62	Educational services, health care, and social assistance	28,883	1.9%	9.7%
4000	Arizona	10	61, 62	Educational services, health care, and social assistance	28,643	1.8%	9.4%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
9000	Connecticut	10	61, 62	Educational services, health care, and social assistance	26,232	1.7%	10.1%
8000	Colorado	10	61, 62	Educational services, health care, and social assistance	23,081	1.5%	7.2%
22000	Louisiana	10	61, 62	Educational services, health care, and social assistance	19,464	1.3%	8.2%
41000	Oregon	10	61, 62	Educational services, health care, and social assistance	19,624	1.3%	8.6%
21000	Kentucky	10	61, 62	Educational services, health care, and social assistance	17,212	1.1%	8.8%
1000	Alabama	10	61, 62	Educational services, health care, and social assistance	16,171	1.0%	7.9%
45000	South Carolina	10	61, 62	Educational services, health care, and social assistance	15,140	1.0%	7.2%
40000	Oklahoma	10	61, 62	Educational services, health care, and social assistance	14,161	0.9%	7.8%
19000	Iowa	10	61, 62	Educational services, health care, and social assistance	13,883	0.9%	7.5%
20000	Kansas	10	61, 62	Educational services, health care, and social assistance	12,331	0.8%	8.2%
5000	Arkansas	10	61, 62	Educational services, health care, and social assistance	10,704	0.7%	8.8%
49000	Utah	10	61, 62	Educational services, health care, and social assistance	11,029	0.7%	7.0%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
11000	District of Columbia	10	61, 62	Educational services, health care, and social assistance	9,763	0.6%	7.7%
31000	Nebraska	10	61, 62	Educational services, health care, and social assistance	9,293	0.6%	7.9%
32000	Nevada	10	61, 62	Educational services, health care, and social assistance	9,070	0.6%	6.2%
28000	Mississippi	10	61, 62	Educational services, health care, and social assistance	8,900	0.6%	8.2%
33000	New Hampshire	10	61, 62	Educational services, health care, and social assistance	8,373	0.5%	10.8%
23000	Maine	10	61, 62	Educational services, health care, and social assistance	7,680	0.5%	13.0%
54000	West Virginia	10	61, 62	Educational services, health care, and social assistance	7,525	0.5%	10.3%
44000	Rhode Island	10	61, 62	Educational services, health care, and social assistance	7,429	0.5%	12.9%
35000	New Mexico	10	61, 62	Educational services, health care, and social assistance	7,602	0.5%	8.1%
15000	Hawaii	10	61, 62	Educational services, health care, and social assistance	6,257	0.4%	7.4%
16000	Idaho	10	61, 62	Educational services, health care, and social assistance	6,054	0.4%	8.9%
10000	Delaware	10	61, 62	Educational services, health care, and social assistance	5,370	0.3%	7.5%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
46000	South Dakota	10	61, 62	Educational services, health care, and social assistance	4,722	0.3%	9.8%
30000	Montana	10	61, 62	Educational services, health care, and social assistance	4,553	0.3%	9.8%
50000	Vermont	10	61, 62	Educational services, health care, and social assistance	4,033	0.3%	13.0%
38000	North Dakota	10	61, 62	Educational services, health care, and social assistance	4,079	0.3%	7.6%
2000	Alaska	10	61, 62	Educational services, health care, and social assistance	3,801	0.2%	7.5%
56000	Wyoming	10	61, 62	Educational services, health care, and social assistance	1,674	0.1%	4.4%
0	United States	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	751,148	.	.
6000	California	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	112,207	14.9%	4.3%
36000	New York	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	60,838	8.1%	4.1%
12000	Florida	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	58,110	7.7%	6.3%
48000	Texas	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	57,903	7.7%	3.6%
17000	Illinois	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	31,053	4.1%	3.9%

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Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
32000	Nevada	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	25,548	3.4%	17.5%
42000	Pennsylvania	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	24,579	3.3%	3.4%
39000	Ohio	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	21,234	2.8%	3.4%
25000	Massachusetts	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	19,704	2.6%	3.9%
34000	New Jersey	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	18,731	2.5%	3.3%
13000	Georgia	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	17,556	2.3%	3.3%
37000	North Carolina	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	18,803	2.5%	3.6%
26000	Michigan	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	16,945	2.3%	3.5%
53000	Washington	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	16,951	2.3%	3.6%
8000	Colorado	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	16,362	2.2%	5.1%
51000	Virginia	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	15,935	2.1%	3.2%
47000	Tennessee	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	16,609	2.2%	5.0%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
4000	Arizona	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	14,050	1.9%	4.6%
24000	Maryland	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	13,927	1.9%	3.6%
29000	Missouri	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	11,960	1.6%	4.0%
18000	Indiana	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	11,952	1.6%	3.4%
27000	Minnesota	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	11,426	1.5%	3.4%
22000	Louisiana	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	10,916	1.5%	4.6%
55000	Wisconsin	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	9,562	1.3%	3.1%
45000	South Carolina	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	9,980	1.3%	4.8%
9000	Connecticut	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	8,261	1.1%	3.2%
15000	Hawaii	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	8,231	1.1%	9.7%
41000	Oregon	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	8,519	1.1%	3.7%
21000	Kentucky	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	7,197	1.0%	3.7%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
1000	Alabama	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	6,361	0.8%	3.1%
40000	Oklahoma	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	6,358	0.8%	3.5%
49000	Utah	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	5,329	0.7%	3.4%
19000	Iowa	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	5,283	0.7%	2.9%
11000	District of Columbia	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	4,837	0.6%	3.8%
28000	Mississippi	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	5,061	0.7%	4.7%
20000	Kansas	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	4,765	0.6%	3.2%
5000	Arkansas	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	3,843	0.5%	3.2%
35000	New Mexico	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	3,722	0.5%	4.0%
31000	Nebraska	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	3,166	0.4%	2.7%
33000	New Hampshire	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	3,308	0.4%	4.3%
54000	West Virginia	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	2,853	0.4%	3.9%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
23000	Maine	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	3,022	0.4%	5.1%
44000	Rhode Island	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	2,763	0.4%	4.8%
16000	Idaho	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	2,490	0.3%	3.6%
30000	Montana	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	2,432	0.3%	5.3%
10000	Delaware	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	2,004	0.3%	2.8%
50000	Vermont	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	1,882	0.3%	6.1%
2000	Alaska	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	1,822	0.2%	3.6%
46000	South Dakota	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	1,834	0.2%	3.8%
56000	Wyoming	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	1,573	0.2%	4.1%
38000	North Dakota	11	71, 72	Arts, entertainment, recreation, accommodation, and food services	1,391	0.2%	2.6%
0	United States	12	81	Other services (except public administration)	415,680	.	.
6000	California	12	81	Other services (except public administration)	56,210	13.5%	2.1%
48000	Texas	12	81	Other services (except public administration)	34,144	8.2%	2.1%

Appendix A

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
36000	New York	12	81	Other services (except public administration)	30,647	7.4%	2.0%
12000	Florida	12	81	Other services (except public administration)	26,058	6.3%	2.8%
17000	Illinois	12	81	Other services (except public administration)	18,705	4.5%	2.3%
42000	Pennsylvania	12	81	Other services (except public administration)	16,726	4.0%	2.3%
39000	Ohio	12	81	Other services (except public administration)	13,319	3.2%	2.1%
51000	Virginia	12	81	Other services (except public administration)	12,962	3.1%	2.6%
34000	New Jersey	12	81	Other services (except public administration)	11,995	2.9%	2.1%
26000	Michigan	12	81	Other services (except public administration)	11,500	2.8%	2.3%
13000	Georgia	12	81	Other services (except public administration)	10,380	2.5%	2.0%
37000	North Carolina	12	81	Other services (except public administration)	10,636	2.6%	2.0%
53000	Washington	12	81	Other services (except public administration)	9,547	2.3%	2.0%
25000	Massachusetts	12	81	Other services (except public administration)	9,883	2.4%	2.0%
24000	Maryland	12	81	Other services (except public administration)	8,882	2.1%	2.3%
47000	Tennessee	12	81	Other services (except public administration)	8,214	2.0%	2.5%
11000	District of Columbia	12	81	Other services (except public administration)	8,357	2.0%	6.6%
18000	Indiana	12	81	Other services (except public administration)	7,852	1.9%	2.3%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
8000	Colorado	12	81	Other services (except public administration)	7,748	1.9%	2.4%
27000	Minnesota	12	81	Other services (except public administration)	7,282	1.8%	2.1%
29000	Missouri	12	81	Other services (except public administration)	7,071	1.7%	2.4%
55000	Wisconsin	12	81	Other services (except public administration)	6,829	1.6%	2.2%
4000	Arizona	12	81	Other services (except public administration)	6,584	1.6%	2.2%
1000	Alabama	12	81	Other services (except public administration)	5,193	1.2%	2.5%
22000	Louisiana	12	81	Other services (except public administration)	5,304	1.3%	2.2%
9000	Connecticut	12	81	Other services (except public administration)	5,213	1.3%	2.0%
45000	South Carolina	12	81	Other services (except public administration)	5,144	1.2%	2.5%
41000	Oregon	12	81	Other services (except public administration)	4,826	1.2%	2.1%
49000	Utah	12	81	Other services (except public administration)	4,363	1.1%	2.8%
21000	Kentucky	12	81	Other services (except public administration)	4,258	1.0%	2.2%
40000	Oklahoma	12	81	Other services (except public administration)	3,984	1.0%	2.2%
19000	Iowa	12	81	Other services (except public administration)	3,798	0.9%	2.1%
20000	Kansas	12	81	Other services (except public administration)	3,407	0.8%	2.3%
32000	Nevada	12	81	Other services (except public administration)	2,912	0.7%	2.0%

Appendix A

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
5000	Arkansas	12	81	Other services (except public administration)	2,817	0.7%	2.3%
28000	Mississippi	12	81	Other services (except public administration)	2,626	0.6%	2.4%
31000	Nebraska	12	81	Other services (except public administration)	2,406	0.6%	2.0%
35000	New Mexico	12	81	Other services (except public administration)	2,042	0.5%	2.2%
15000	Hawaii	12	81	Other services (except public administration)	1,981	0.5%	2.3%
33000	New Hampshire	12	81	Other services (except public administration)	1,862	0.4%	2.4%
54000	West Virginia	12	81	Other services (except public administration)	1,508	0.4%	2.1%
16000	Idaho	12	81	Other services (except public administration)	1,402	0.3%	2.1%
23000	Maine	12	81	Other services (except public administration)	1,382	0.3%	2.3%
44000	Rhode Island	12	81	Other services (except public administration)	1,271	0.3%	2.2%
30000	Montana	12	81	Other services (except public administration)	1,064	0.3%	2.3%
10000	Delaware	12	81	Other services (except public administration)	1,043	0.3%	1.5%
46000	South Dakota	12	81	Other services (except public administration)	1,076	0.3%	2.2%
38000	North Dakota	12	81	Other services (except public administration)	997	0.2%	1.9%
2000	Alaska	12	81	Other services (except public administration)	902	0.2%	1.8%
50000	Vermont	12	81	Other services (except public administration)	742	0.2%	2.4%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
56000	Wyoming	12	81	Other services (except public administration)	626	0.2%	1.6%
0	United States	13	92	Government	2,286,853	.	.
6000	California	13	92	Government	319,429	14.0%	12.2%
48000	Texas	13	92	Government	174,981	7.7%	10.9%
36000	New York	13	92	Government	163,405	7.1%	10.9%
12000	Florida	13	92	Government	108,741	4.8%	11.7%
51000	Virginia	13	92	Government	92,732	4.1%	18.8%
24000	Maryland	13	92	Government	79,218	3.5%	20.7%
17000	Illinois	13	92	Government	76,009	3.3%	9.5%
42000	Pennsylvania	13	92	Government	71,607	3.1%	9.9%
39000	Ohio	13	92	Government	69,649	3.0%	11.1%
37000	North Carolina	13	92	Government	69,520	3.0%	13.3%
13000	Georgia	13	92	Government	64,104	2.8%	12.1%
53000	Washington	13	92	Government	64,246	2.8%	13.5%
34000	New Jersey	13	92	Government	62,793	2.7%	10.9%
25000	Massachusetts	13	92	Government	54,356	2.4%	10.7%
26000	Michigan	13	92	Government	53,162	2.3%	10.8%
11000	District of Columbia	13	92	Government	42,882	1.9%	33.9%
4000	Arizona	13	92	Government	40,509	1.8%	13.2%
8000	Colorado	13	92	Government	40,323	1.8%	12.5%
47000	Tennessee	13	92	Government	37,627	1.6%	11.3%
29000	Missouri	13	92	Government	35,823	1.6%	12.0%
55000	Wisconsin	13	92	Government	34,009	1.5%	10.9%
1000	Alabama	13	92	Government	34,732	1.5%	16.9%
27000	Minnesota	13	92	Government	33,858	1.5%	10.0%
45000	South Carolina	13	92	Government	32,907	1.4%	15.7%
18000	Indiana	13	92	Government	31,460	1.4%	9.1%
40000	Oklahoma	13	92	Government	29,429	1.3%	16.2%
21000	Kentucky	13	92	Government	27,568	1.2%	14.0%
9000	Connecticut	13	92	Government	27,327	1.2%	10.5%
22000	Louisiana	13	92	Government	27,161	1.2%	11.5%
41000	Oregon	13	92	Government	26,432	1.2%	11.5%
35000	New Mexico	13	92	Government	22,345	1.0%	23.9%
20000	Kansas	13	92	Government	20,640	0.9%	13.7%
19000	Iowa	13	92	Government	20,821	0.9%	11.2%
49000	Utah	13	92	Government	20,141	0.9%	12.8%
28000	Mississippi	13	92	Government	19,018	0.8%	17.5%

Identifier	State	Industry Id	Industry Classification	Description	Gross domestic product (GDP), 2016 (millions)	State contribution to GDP, 2016 (percent of national GDP for sector)	Contribution to State GDP, 2016 (percent of total State GDP)
15000	Hawaii	13	92	Government	17,535	0.8%	20.7%
32000	Nevada	13	92	Government	16,886	0.7%	11.5%
5000	Arkansas	13	92	Government	15,736	0.7%	13.0%
31000	Nebraska	13	92	Government	14,782	0.6%	12.6%
54000	West Virginia	13	92	Government	11,815	0.5%	16.2%
2000	Alaska	13	92	Government	10,499	0.5%	20.8%
16000	Idaho	13	92	Government	9,392	0.4%	13.7%
33000	New Hampshire	13	92	Government	8,711	0.4%	11.3%
23000	Maine	13	92	Government	8,333	0.4%	14.1%
44000	Rhode Island	13	92	Government	7,896	0.3%	13.7%
30000	Montana	13	92	Government	6,934	0.3%	15.0%
10000	Delaware	13	92	Government	6,860	0.3%	9.6%
56000	Wyoming	13	92	Government	6,252	0.3%	16.3%
38000	North Dakota	13	92	Government	6,022	0.3%	11.3%
46000	South Dakota	13	92	Government	5,577	0.2%	11.5%
50000	Vermont	13	92	Government	4,659	0.2%	15.0%

NOTE: This table presents the latest available data which do not sum to latest available industry totals as shown in figures 1-1, 2-1, 3-1, 4-1, 5-1, 6-1, 7-1, and 8-1.

Data shown in figures 1-1 to 8-1 are based on U.S. Department of Commerce, Bureau of Economic Analysis, Value Added by Industry table, available at <http://bea.gov> as of March 2018.

SOURCE: U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product by State, available at <http://bea.gov> as of March 2018.



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