Traffic Safety Facts

2018 Data

July 2020 (revised)

DOT HS 812 884

NHTSA

In this fact sheet for 2018 the information is presented as follows.

U.S. Department of Transportation

National Highway Traffic Safety Administration

1200 New Jersey Avenue SE
Washington, DC 20590

Bicyclists and Other Cyclists

Pedalcyclists, as defined for this fact sheet, are bicyclists and other cyclists including riders of two-wheel, nonmotorized vehicles, tricycles, and unicycles powered solely by pedals. A traffic crash is defined as an incident that involved one or more motor vehicles where at least one vehicle was in transport and the crash originated on a public trafficway such as a road or highway. Crashes that occurred on private property, including parking lots and driveways, are excluded. Pedalcyclist crashes in this fact sheet exclude crashes that do not involve motor vehicles.

Key Findings

- There were 857 pedalcyclist deaths in 2018, which accounted for 2.3 percent of all traffic fatalities during the year.
- Seventy-nine percent of pedalcyclists who died in motor vehicle crashes in 2018 were in urban areas.
- Over the 10-year period 2009 to 2018, the average age of pedalcyclists killed in motor vehicle crashes has increased from 41 to 47.
- The pedalcyclist fatality rate per million people was 7 times higher for males than females, and the pedalcyclist injury rate per million people was 5 times higher for males than for females in 2018.
- Alcohol involvement – either for the motor vehicle driver or for the pedalcyclist – was reported in 37 percent of all fatal pedalcyclist crashes in 2018.
- Twenty-six percent of the pedalcyclists who died in 2018 had blood alcohol concentrations (BACs) of .01 grams per deciliter (g/dL) or greater.

This fact sheet contains information on fatal motor vehicle crashes and fatalities based on data from the Fatality Analysis Reporting System (FARS). Refer to the end of this publication for more information on FARS. Injury estimates are based on data obtained from a nationally representative sample of police-reported crashes from the Crash Report Sampling System. In addition, the methodology for estimating people injured has changed. For more information, read **Crash Report Sampling System (CRSS) Replaces the National Automotive Sampling System (NASS) General Estimates System (GES)** at the end of this publication.

Overview

In 2018 there were 857 pedalcyclists killed in motor vehicle traffic crashes in the United States, an increase from 806 in 2017. Pedalcyclist deaths accounted for 2.3 percent of all motor vehicle traffic fatalities (Table 1).

Table 1 presents the distribution of pedalcyclist fatalities as a percentage of total fatalities as well as pedalcyclists injured as a percentage of total people injured in the 10-year period from 2009 to 2018. Pedalcyclist deaths have accounted from a high of 2.3 percent to a low of 1.9 percent in those 10 years. The number of pedalcyclists killed in 2018 was 6.3 percent higher than the 806 pedalcyclists killed in 2017.

In 2018 there were an estimated 47,000 pedalcyclists injured, a 6.4-percent decrease from 50,000 pedalcyclists injured in 2017. Pedalcyclists injured made up of 1.7 percent of the total people injured in 2018.

Table 1

Total Fatalities and Pedalcyclist Fatalities, and Total Injured and Pedalcyclists Injured in Traffic Crashes, 2009–2018

		Pedalcyclist Fatalities				Pedalcyclists Injured	
Year	Total Fatalities	Number	Percentage of Total Fatalities	Year	Total Injured	Number	Percentage of Total Injured*
2009	33,883	628	1.9%	2009	2,224,000	51,000	2.3%
2010	32,999	623	1.9%	2010	2,248,000	52,000	2.3%
2011	32,479	682	2.1%	2011	2,227,000	48,000	2.2%
2012	33,782	734	2.2%	2012	2,369,000	49,000	2.1%
2013	32,893	749	2.3%	2013	2,319,000	48,000	2.1%
2014	32,744	729	2.2%	2014	2,343,000	50,000	2.2%
2015	35,484	829	2.3%	2015	2,455,000	45,000	1.8%
2016	37,806	853	2.3%	2016†	3,062,000	64,000	2.1%
2017	37,473	806	2.2%	2017†	2,745,000	50,000	1.8%
2018	36,560	857	2.3%	2018†	2,710,000	47,000	1.7%

Source: FARS 2009–2017 Final File, 2018 Annual Report File (ARF); NASS GES 2009–2015 and CRSS 2016–2018
*Percentages were calculated using injury estimates before rounding.
†CRSS estimates and NASS GES estimates are not comparable due to different sample designs. Refer to end of document for more information about CRSS.

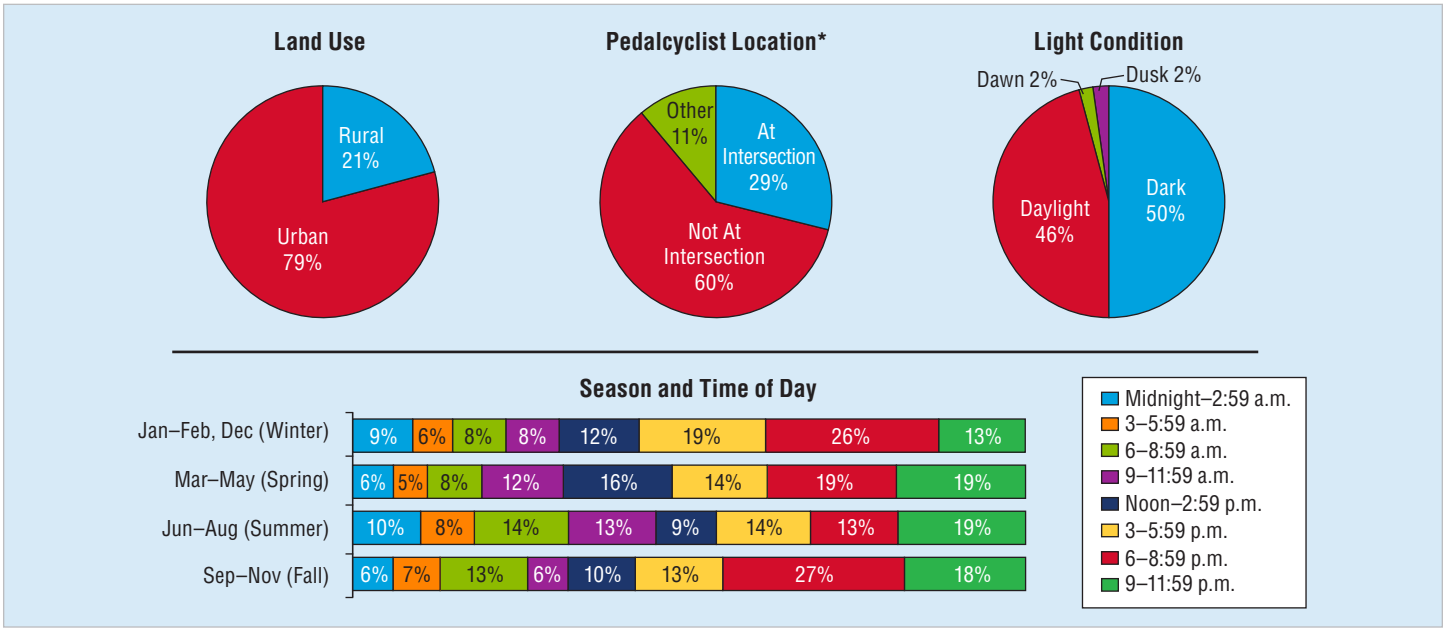
Environmental Characteristics

Figure 1 shows information about the settings surrounding pedalcyclist fatalities in 2018: land use, pedalcyclist location, light condition, and season and time of day.

- The majority of pedalcyclist fatalities occurred in urban areas (79%) as opposed to rural areas (21%).
- Twenty-nine percent of the pedalcyclist fatalities occurred at intersections, 60 percent occurred at locations that were not intersections, and the remaining 11 percent occurred at other locations such as roadsides/shoulders, parking lanes/zones, bicycle lanes, sidewalks, medians/crossing islands, driveway accesses, shared-use paths/trails, non-traffic way areas, and other sites.
- More pedalcyclist fatalities occurred in the dark (50%) than in daylight (46%), dusk (2%), and dawn (2%).
- Time of day is divided into eight 3-hour intervals starting at midnight, and season is defined by months.
  - During the winter months (January, February, and the following December), the largest group (26%) of pedalcyclist fatalities occurred from 6 to 8:59 p.m., followed by 19 percent from 3 to 5:59 p.m.
  - During the spring months (March to May), the 6 to 8:59 p.m. and 9 to 11:59 p.m. time periods had the highest percentage (19%) of pedalcyclist fatalities, followed by 16 percent from noon to 2:59 p.m., and 14 percent from 3 to 5:59 p.m.
  - During the summer months (June to August), more pedalcyclist fatalities occurred from 9 to 11:59 p.m. (19%) than any other time, followed by 14 percent from 6 to 8:59 a.m. and from 3 to 5:59 p.m.
  - During the fall months (September to November), 27 percent of the pedalcyclist fatalities occurred from 6 to 8:59 p.m., followed by 18 percent from 9 to 11:59 p.m.

Figure 1

Percentage of Pedalcyclist Fatalities in Relation to Land Use, Pedalcyclist Location, Light Condition, and Season and Time of Day, 2018



Source: FARS 2018 ARF

*Based on location of pedalcyclist struck at the time of the crash. "Other" includes sidewalk, bicycle lane, median/crossing island, parking lane/zone, shoulder/roadside, driveway access, shared-use path, and non-traffic area, which may or may not have been at intersection, but were not distinguished by collected data. Thus, "At Intersection" and "Not at Intersection" do not include those in the "Other" category that were at intersection or not at intersection.

Note: Percentages may not add up to 100 percent due to independent rounding. Unknowns were removed before calculating percentages.

Time of Day and Day of Week

In Figure 2 the time of day is divided into eight 3-hour time intervals starting at midnight, and day of week is defined as weekday (Monday 6 a.m. to Friday 5:59 p.m.) and weekend (Friday 6 p.m. to Monday 5:59 a.m.). To summarize this information concerning 2018 pedalcyclist fatalities:

- The time period 6 to 8:59 p.m. had the highest frequency of pedalcyclist fatalities during both weekdays (19%) and weekends (23%).
- On weekdays, the second highest percentage (18%) of pedalcyclist fatalities occurred between 3 and 5:59 p.m. On weekends, the second highest percentage (20%) of pedalcyclist fatalities occurred between 9 and 11:59 p.m.

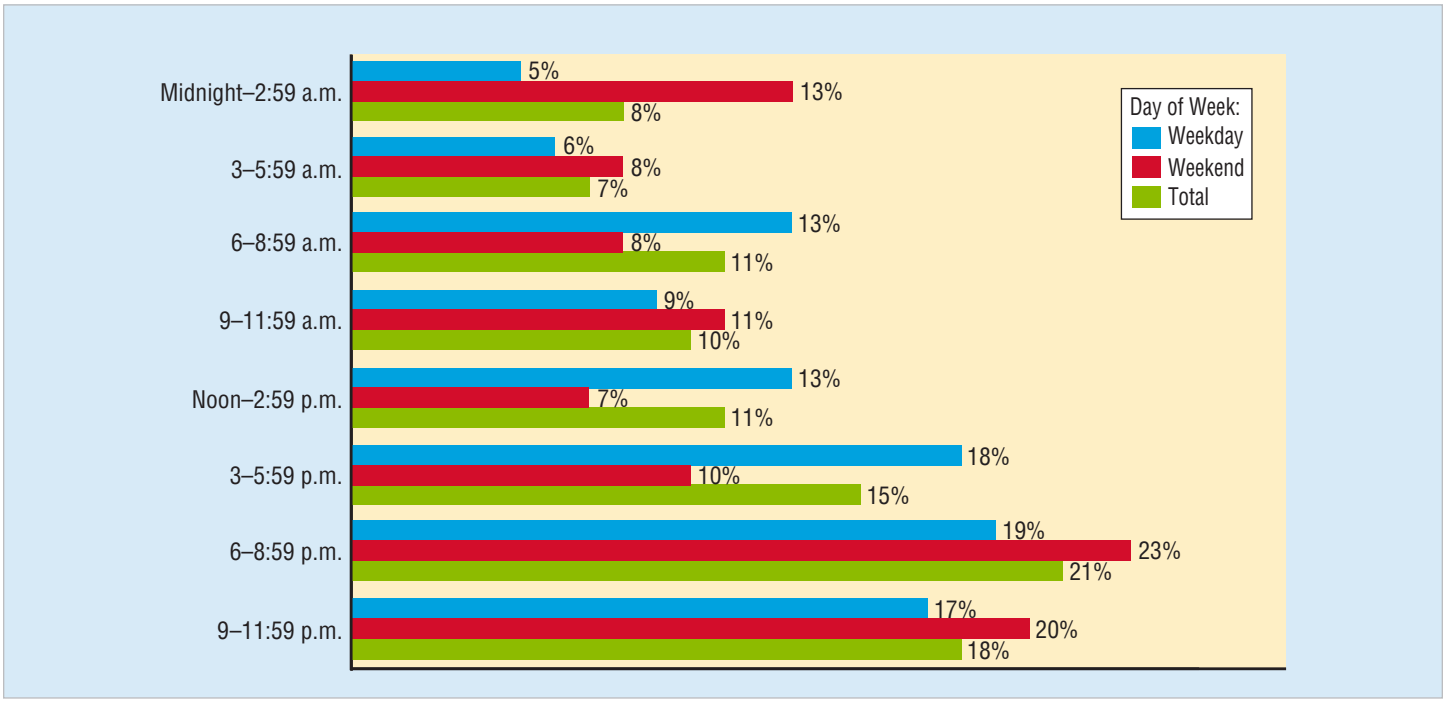
Important Safety Reminders

- All bicyclists should wear properly fitted bicycle helmets every time they ride. A helmet is the single most effective way to prevent head injury resulting from a bicycle crash.
- Bicyclists are considered vehicle operators; they are required to obey the same rules of the road as other vehicle operators, including obeying traffic signs, signals, and lane markings. When cycling in the street, cyclists must ride in the same direction as traffic.
- Drivers of motor vehicles need to share the road with bicyclists. Be courteous – allow at least 3 feet of clearance when passing a bicyclist on the road, look for cyclists before opening a car door or pulling from a parking space, and yield to cyclists at intersections and as directed by signs and signals. Be especially watchful for cyclists when making turns, either left or right.
- Bicyclists should increase their visibility to drivers by wearing fluorescent or brightly colored clothing during the day, and at dawn and dusk. To be noticed when riding at night, use a front light and a red reflector or flashing rear light, and use retro-reflective tape or markings on equipment or clothing.

— NHTSA's Office of Safety Programs

For more information on Bicycle Safety visit www.nhtsa.gov/Driving-Safety/Bicycles.

Figure 2
Percentage of Pedalcyclist Fatalities, by Time of Day and Day of Week, 2018



Source: FARS 2018 ARF
Weekday – Monday 6 a.m. to Friday 5:59 p.m.
Weekend – Friday 6 p.m. to Monday 5:59 a.m.

Age and Sex

In 2018 the average age of pedalcyclists killed in traffic crashes was 47. Over the past 10 years the average age of those killed has steadily increased. The average age of pedalcyclists killed has increased from 41 in 2009 to 47 in 2018.

Table 2 contains the number of pedalcyclists killed and injured in 2018 by age group and sex. For each sex and the total, the fatality rate per million population is calculated by age group. In 2018 the majority of pedalcyclists killed (86%) in 2018 were males. The population-based pedalcyclist fatality rate was 7 times higher for males than for females. The pedalcyclist injury rate was 5 times higher for males than for females. The overall male pedalcyclist injury rate was 236, compared with 51 for females.

The largest number of pedalcyclist fatalities were in the 55-to-59 age group. Pedalcyclists 50-to-54 years old had the highest fatality rate (4.60 per million people) based on population. The highest pedalcyclist injury rate by age group were those 20-to-24 and 15-to-19 (285 and 268 per million population, respectively).

In 2018 children under 15 accounted for 4 percent of all pedalcyclists killed. And the population-based injury rate for children under 15 was 83.

Table 2

Pedalcyclists Killed and Injured in Traffic Crashes and Fatality and Injury Rates per Million Population, by Age Group and Sex, 2018

Age Group	Male			Female			Total*		
	Killed	Population (thousands)	Fatality Rate	Killed	Population (thousands)	Fatality Rate	Killed	Population (thousands)	Fatality Rate
<5	3	10,132	0.30	2	9,678	0.21	5	19,810	0.25
5–9	8	10,316	0.78	5	9,880	0.51	13	20,196	0.64
10–14	18	10,659	1.69	1	10,221	0.10	19	20,880	0.91
Children (≤14)	*29*	*31,107*	*0.93*	*8*	*29,779*	*0.27*	*37*	*60,886*	*0.61*
15–19	43	10,775	3.99	10	10,322	0.97	53	21,097	2.51
20–24	41	11,202	3.66	9	10,672	0.84	50	21,874	2.29
25–29	35	12,019	2.91	5	11,543	0.43	40	23,562	1.70
30–34	49	11,192	4.38	10	10,944	0.91	59	22,136	2.67
35–39	34	10,790	3.15	11	10,773	1.02	45	21,564	2.09
40–44	56	9,797	5.72	10	9,917	1.01	66	19,714	3.35
45–49	58	10,264	5.65	8	10,483	0.76	66	20,747	3.18
50–54	85	10,277	8.27	11	10,607	1.04	96	20,885	4.60
55–59	87	10,669	8.15	13	11,272	1.15	100	21,941	4.56
60–64	78	9,730	8.02	6	10,602	0.57	84	20,332	4.13
65–69	39	8,035	4.85	7	9,052	0.77	46	17,087	2.69
70–74	45	6,211	7.24	2	7,194	0.28	47	13,405	3.51
75–79	26	4,145	6.27	2	5,122	0.39	28	9,267	3.02
80+	20	4,916	4.07	0	7,756	0.00	20	12,672	1.58
Ages 65+	*130*	*23,307*	*5.58*	*11*	*29,124*	*0.38*	*141*	*52,431*	*2.69*
Total[1]	**737**	**161,129**	**4.57**	**115**	**166,039**	**0.69**	**857**	**327,167**	**2.62**

Age Group	Male			Female			Total		
	Injured	Population (thousands)	Injury Rate[2]	Injured	Population (thousands)	Injury Rate[2]	Injured	Population (thousands)	Injury Rate[2]
<5	**	10,132	**	**	9,678	**	**	19,810	**
5–9	1,000	10,316	63	**	9,880	**	1,000	20,196	45
10–14	3,000	10,659	304	1,000	10,221	83	4,000	20,880	196
Children (≤14)	*4,000*	*31,107*	*126*	*1,000*	*29,779*	*38*	*5,000*	*60,886*	*83*
15–19	5,000	10,775	420	1,000	10,322	109	6,000	21,097	268
20–24	5,000	11,202	441	1,000	10,672	121	6,000	21,874	285
25–29	4,000	12,019	300	1,000	11,543	73	4,000	23,562	189
30–34	3,000	11,192	288	1,000	10,944	65	4,000	22,136	178
35–39	3,000	10,790	236	1,000	10,773	50	3,000	21,564	143
40–44	2,000	9,797	216	**	9,917	**	3,000	19,714	131
45–49	3,000	10,264	272	**	10,483	**	3,000	20,747	147
50–54	3,000	10,277	282	**	10,607	**	3,000	20,885	160
55–59	3,000	10,669	301	1,000	11,272	65	4,000	21,941	180
60–64	2,000	9,730	154	**	10,602	**	2,000	20,332	87
65–69	1,000	8,035	163	**	9,052	**	2,000	17,087	95
70–74	1,000	6,211	139	**	7,194	**	1,000	13,405	87
75–79	**	4,145	**	**	5,122	**	**	9,267	**
80+	**	4,916	**	**	7,756	**	**	12,672	**
Ages 65+	*3,000*	*23,307*	*119*	*1,000*	*29,124*	*22*	*3,000*	*52,431*	*65*
Total[3]	**38,000**	**161,129**	**236**	**8,000**	**166,039**	**51**	**47,000**	**327,167**	**142**

Sources: FARS 2018 ARF, CRSS 2018; Population – Census Bureau
*Includes fatalities of unknown sex.
**Less than 500 injured; injury rate not shown.
[1] Includes fatalities of unknown age.
[2] Were calculated using injured estimates before rounding.
[3] Injured totals may not equal sum of components due to independent rounding.

Alcohol

Alcohol involvement (BAC of .01+ g/dL) – either for a motor vehicle driver involved in a fatal pedalcyclist crash and/or the killed pedalcyclist – was reported in 37 percent of the traffic crashes that resulted in pedalcyclist fatalities in 2018, as shown in Table 3. (Note that Table 3 contains data about the number and percentages of crashes rather than the number and percentages of fatalities as in Table 4.) If more than one pedalcyclist was killed in a crash, the pedalcyclist with the highest BAC was used. If more than one driver was involved in a crash, the driver with the highest BAC was used.

- An estimated 20 percent of fatal pedalcyclist crashes each had a pedalcyclist with a BAC of .08 g/dL or higher.
- An estimated 15 percent of fatal pedalcyclist crashes each had a driver with a BAC of .08 g/dL or higher. Note that a BAC of .08 g/dL is the legal limit for alcohol impairment for drivers in all 50 States.

Table 3
Crashes Resulting in Pedalcyclist Fatalities, by Alcohol Involvement of Drivers and Pedalcyclists, 2018

	Driver, No Alcohol, BAC=.00 g/dL		Driver, BAC=.01–.07 g/dL		Alcohol-Impaired Driver, BAC=.08+ g/dL		Total	
	Number	Percent	Number	Percent	Number	Percent	Number	Percent
Pedalcyclist, No Alcohol	537	63%	18	2%	88	10%	644	75%
Pedalcyclist, BAC=.01–.07 g/dL	30	3%	4	0%	10	1%	44	5%
Pedalcyclist, BAC=.08+ g/dL	130	15%	6	1%	31	4%	167	20%
Total Crashes	**697**	**82%**	**28**	**3%**	**129**	**15%**	**854**	**100%**

Source: FARS 2018 ARF
Note: The alcohol levels in this table were determined using the alcohol levels of the pedalcyclists killed and the involved drivers (killed or survived).

As shown in Table 4, more than one-fourth (26%) of the pedalcyclists killed in 2018 had BACs of .01 g/dL or higher, and one-fifth (20%) had BACs of .08 g/dL or higher. These percentages are markedly lower than 10 years ago when 31 percent of pedalcyclists killed had BACs of .01 g/dL or higher and 27 percent had BACs of .08 g/dL or higher.

In 2009 the age group 45-to-54 had the highest alcohol involvement (45%) at .01+ g/dL, and this age group also had the highest alcohol impairment (40%) at .08+ g/dL.

In 2018 those in the 35-to-44 age group had highest percentages with both BACs of .01 g/dL or higher (36%) and BACs of .08 g/dL or higher (29%).

Table 4
Pedalcyclists Killed in Traffic Crashes, by Age Group and Their BACs, 2009 and 2018

	2009					2018				
Age Group	Number of Fatalities	Percentage With No Alcohol (BAC=.00 g/dL)	Percentage With BAC=.01+ g/dL	Percentage With BAC=.01–.07 g/dL	Percentage With BAC=.08+ g/dL	Number of Fatalities	Percentage With No Alcohol (BAC=.00 g/dL)	Percentage With BAC=.01+ g/dL	Percentage With BAC=.01–.07 g/dL	Percentage With BAC=.08+ g/dL
16–20	37	89%	11%	4%	7%	56	88%	12%	3%	9%
21–24	29	65%	35%	3%	31%	38	83%	17%	4%	13%
25–34	70	63%	37%	3%	34%	99	75%	25%	6%	19%
35–44	105	60%	40%	6%	34%	111	64%	36%	6%	29%
45–54	140	55%	45%	5%	40%	162	70%	30%	6%	25%
55–64	86	79%	21%	4%	17%	184	69%	31%	6%	25%
65–74	53	86%	14%	2%	12%	93	86%	14%	4%	10%
75–84	20	99%	1%	0%	1%	38	89%	11%	3%	8%
85+	3	97%	3%	3%	0%	10	88%	12%	0%	12%
Total Killed*	**543**	**69%**	**31%**	**4%**	**27%**	**791**	**74%**	**26%**	**5%**	**20%**

Source: FARS 2009 Final File, 2018 ARF
*Excludes pedalcyclists younger than 16 and pedalcyclists of unknown age.

Vehicle Type and Impact Point

Of the 804 pedalcyclists killed in single-vehicle crashes, 99 percent (795) were killed in crashes where the first harmful event was collision with a pedalcyclist. Table 5 presents the 795 pedalcyclists killed in these crashes by vehicle type and location of the initial impact on the striking vehicle.

In 2018:

- Pedalcyclists who died in single-vehicle crashes were most likely to be struck by the front of the vehicles.
- Light trucks were the most frequently involved vehicle in motor vehicle crashes in which a pedalcyclist was killed. Forty-five percent (356 of the 795) of the pedalcyclists killed were contacted by light trucks. In 88 percent (313) of these crashes, the pedalcyclist came in contact with the front of the light truck.
- Large trucks and buses showed a different pattern than passenger vehicles with respect to impact point. Fewer than one-half of the pedalcyclists killed were struck by the front of the large truck, and fewer than three-fifths were contacted by the front of the bus, compared to over 85 percent for other vehicles.
- Bus and large truck had the highest percentage of right-side impacts, accounting for 29 and 24 percent of the fatalities, respectively, whereas for passenger vehicles this percentage was 5 percent. Large trucks also had the highest percentage of rear impact.

Table 5
Pedalcyclists Killed in Single-Vehicle Crashes Where the First Harmful Event Was Collision With a Pedalcyclist, by Vehicle Type and Initial Point of Impact on Vehicle, 2018

	Initial Point of Impact on Vehicle										Total	
	Front		Right Side		Left Side		Rear		Other/Unknown			
Vehicle Type	Number	Percent	Number	Percent	Number	Percent	Number	Percent	Number	Percent	Number	Percent
Passenger Car	256	87.1%	15	5.1%	9	3.1%	3	1.0%	11	3.7%	294	100.0%
Light Truck*	313	87.9%	19	5.3%	10	2.8%	4	1.1%	10	2.8%	356	100.0%
– SUV	*128*	*85.3%*	*7*	*4.7%*	*6*	*4.0%*	*1*	*0.7%*	*8*	*5.3%*	*150*	*100.0%*
– Pickup	*144*	*88.9%*	*10*	*6.2%*	*4*	*2.5%*	*3*	*1.9%*	*1*	*0.6%*	*162*	*100.0%*
– Van	*37*	*94.9%*	*2*	*5.1%*	*0*	*0.0%*	*0*	*0.0%*	*0*	*0.0%*	*39*	*100.0%*
Large Truck	32	45.1%	17	23.9%	5	7.0%	9	12.7%	8	11.3%	71	100.0%
Bus	4	57.1%	2	28.6%	0	0.0%	0	0.0%	1	14.3%	7	100.0%
Other/Unknown Vehicle	45	67.2%	1	1.5%	2	3.0%	0	0.0%	19	28.4%	67	100.0%
Total	**650**	**81.8%**	**54**	**6.8%**	**26**	**3.3%**	**16**	**2.0%**	**49**	**6.2%**	**795**	**100.0%**

Source: FARS 2018 ARF
*Includes other/unknown light-truck vehicle types.

Fatalities by State

Table 6 shows the population, numbers of total and pedalcyclist fatalities, the percentage of total fatalities who were pedalcyclists, and the population-based pedalcyclist fatality rates by State for 2018. Among all States, the District of Columbia, and Puerto Rico, fatalities in all motor vehicle traffic crashes in 2018 ranged from 31 (District of Columbia) to 3,642 (Texas), in part depending on size and population. Note that in this section, as well as the following section on fatalities by city, the populations of States and cities can vary greatly from the recorded resident population. States with substantial seasonal tourism, such as Florida, and cities with a large influx of daily commuters, such as Washington, DC, have at times a substantially larger population than is reflected in their numbers of residents. Puerto Rico is included in Table 6, but is not included in the overall U.S. total. Figure 3 contains a color-coded map of the percentage of total traffic fatalities who were pedalcyclists by State in 2018.

In 2018:

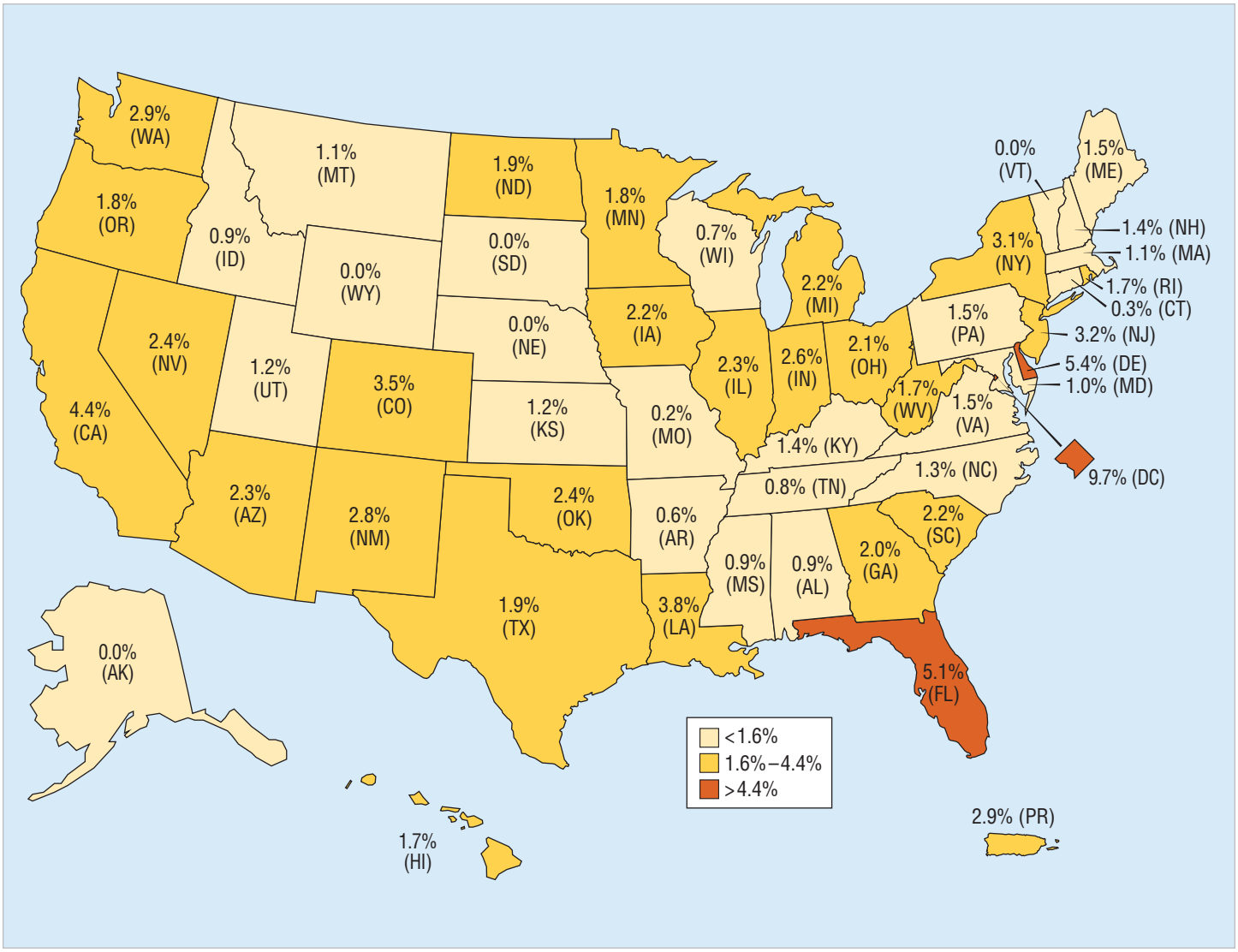
- Pedalcyclist fatalities were highest in Florida (161), California (155), and Texas (69). Every other State had 30 or fewer pedalcyclist fatalities.
- There were no pedalcyclist fatalities in Alaska, Nebraska, South Dakota, Vermont or Wyoming.

- The percentage of pedalcyclist fatalities among total fatalities in States ranged from a high of 9.7 percent (the District of Columbia) to a low of 0.2 percent (Missouri) for those States experiencing pedalcyclist fatalities, compared to the national percentage of 2.3 percent as shown in Figure 3.
- The highest fatality rate per million population was in Florida (7.56 fatalities per million residents) followed by Louisiana (6.22 fatalities per million residents), compared to the national rate of 2.62. Of those States that experienced pedalcyclist fatalities, Connecticut had the lowest fatality rate per million population (0.28) followed by Missouri (0.33).

Additional State/county-level data is available at NHTSA's State Traffic Safety Information website, https://cdan.nhtsa.gov/stsi.htm.

Figure 3

Percentage of Total Fatalities Who Were Pedalcyclists, by State, 2018



Source: FARS 2018 ARF

Table 6

Total and Pedalcyclist Fatalities, and Pedalcyclist Fatality Rates, by State, 2018

State	Total Fatalities	Pedalcyclist Fatalities		Population	Pedalcyclist Fatality Rate Per Million Population
		Number	Percentage of Total Fatalities		
Alabama	953	9	0.9%	4,887,871	1.84
Alaska	80	0	0.0%	737,438	0.00
Arizona	1,010	23	2.3%	7,171,646	3.21
Arkansas	516	3	0.6%	3,013,825	1.00
California	3,563	155	4.4%	39,557,045	3.92
Colorado	632	22	3.5%	5,695,564	3.86
Connecticut	294	1	0.3%	3,572,665	0.28
Delaware	111	6	5.4%	967,171	6.20
District of Columbia	31	3	9.7%	702,455	4.27
Florida	3,133	161	5.1%	21,299,325	7.56
Georgia	1,504	30	2.0%	10,519,475	2.85
Hawaii	117	2	1.7%	1,420,491	1.41
Idaho	231	2	0.9%	1,754,208	1.14
Illinois	1,031	24	2.3%	12,741,080	1.88
Indiana	858	22	2.6%	6,691,878	3.29
Iowa	318	7	2.2%	3,156,145	2.22
Kansas	404	5	1.2%	2,911,505	1.72
Kentucky	724	10	1.4%	4,468,402	2.24
Louisiana	768	29	3.8%	4,659,978	6.22
Maine	137	2	1.5%	1,338,404	1.49
Maryland	501	5	1.0%	6,042,718	0.83
Massachusetts	360	4	1.1%	6,902,149	0.58
Michigan	974	21	2.2%	9,995,915	2.10
Minnesota	381	7	1.8%	5,611,179	1.25
Mississippi	664	6	0.9%	2,986,530	2.01
Missouri	921	2	0.2%	6,126,452	0.33
Montana	182	2	1.1%	1,062,305	1.88
Nebraska	230	0	0.0%	1,929,268	0.00
Nevada	330	8	2.4%	3,034,392	2.64
New Hampshire	147	2	1.4%	1,356,458	1.47
New Jersey	564	18	3.2%	8,908,520	2.02
New Mexico	391	11	2.8%	2,095,428	5.25
New York	943	29	3.1%	19,542,209	1.48
North Carolina	1,437	18	1.3%	10,383,620	1.73
North Dakota	105	2	1.9%	760,077	2.63
Ohio	1,068	22	2.1%	11,689,442	1.88
Oklahoma	655	16	2.4%	3,943,079	4.06
Oregon	506	9	1.8%	4,190,713	2.15
Pennsylvania	1,190	18	1.5%	12,807,060	1.41
Rhode Island	59	1	1.7%	1,057,315	0.95
South Carolina	1,037	23	2.2%	5,084,127	4.52
South Dakota	130	0	0.0%	882,235	0.00
Tennessee	1,041	8	0.8%	6,770,010	1.18
Texas	3,642	69	1.9%	28,701,845	2.40
Utah	260	3	1.2%	3,161,105	0.95
Vermont	68	0	0.0%	626,299	0.00
Virginia	820	12	1.5%	8,517,685	1.41
Washington	546	16	2.9%	7,535,591	2.12
West Virginia	294	5	1.7%	1,805,832	2.77
Wisconsin	588	4	0.7%	5,813,568	0.69
Wyoming	111	0	0.0%	577,737	0.00
U.S. Total	**36,560**	**857**	**2.3%**	**327,167,434**	**2.62**
Puerto Rico	308	9	2.9%	3,195,153	2.82

Sources: FARS 2018 ARF; Population – Census Bureau

Fatalities by City

For each U.S. city with a population of over 500,000, Table 7 shows the population, numbers of total and pedalcyclist fatalities, the percentage of total fatalities who were pedalcyclists, and the population-based fatality rates for both all traffic fatalities and pedalcyclist fatalities in 2018.

- The large cities with the highest pedalcyclist fatality rates were Sacramento (15.73 pedalcyclist fatalities per 1 million people) and Albuquerque (12.5 pedalcyclist fatalities per 1 million people).
- Of those major cities that had pedalcyclist fatalities, the cities with the lowest fatality rates were San Diego (0.7 pedalcyclist fatalities per 1 million people) and Austin (1.04 pedalcyclist fatalities per 1 million people).
- Seven major cities reported zero pedalcyclist fatalities in motor vehicle crashes in 2018: Baltimore, Boston, Columbus, El Paso, Fresno, Milwaukee, and Nashville.

Table 7

Total and Pedalcyclist Fatalities in Cities With Populations of 500,000 or Greater, and Fatality Rates, 2018

City	Total Fatalities	Pedalcyclist Fatalities		Population	Fatality Rate per Million Population	
		Number	Percentage of Total Fatalities		Total	Pedalcyclist
New York, NY	195	9	4.6%	8,398,748	23.22	1.07
Los Angeles, CA	273	20	7.3%	3,990,456	68.41	5.01
Chicago, IL	131	6	4.6%	2,705,994	48.41	2.22
Houston, TX	204	8	3.9%	2,325,502	87.72	3.44
Phoenix, AZ	245	2	0.8%	1,660,272	147.57	1.20
Philadelphia, PA	102	4	3.9%	1,584,138	64.39	2.53
San Antonio, TX	148	4	2.7%	1,532,233	96.59	2.61
San Diego, CA	95	1	1.1%	1,425,976	66.62	0.70
Dallas, TX	198	6	3.0%	1,345,047	147.21	4.46
San Jose, CA	60	5	8.3%	1,030,119	58.25	4.85
Austin, TX	71	1	1.4%	964,254	73.63	1.04
Jacksonville, FL	136	9	6.6%	903,889	150.46	9.96
Fort Worth, TX	102	1	1.0%	895,008	113.97	1.12
Columbus, OH	66	0	0.0%	892,533	73.95	0.00
San Francisco, CA	24	3	12.5%	883,305	27.17	3.40
Charlotte, NC	96	3	3.1%	872,498	110.03	3.44
Indianapolis, IN	103	4	3.9%	867,125	118.78	4.61
Seattle, WA	20	2	10.0%	744,955	26.85	2.68
Denver, CO	60	6	10.0%	716,492	83.74	8.37
Washington, DC	31	3	9.7%	702,455	44.13	4.27
Boston, MA	15	0	0.0%	694,583	21.60	0.00
El Paso, TX	70	0	0.0%	682,669	102.54	0.00
Detroit, MI	107	2	1.9%	672,662	159.07	2.97
Nashville, TN	71	0	0.0%	669,053	106.12	0.00
Portland, OR	37	2	5.4%	653,115	56.65	3.06
Memphis, TN	117	2	1.7%	650,618	179.83	3.07
Oklahoma City, OK	73	2	2.7%	649,021	112.48	3.08
Las Vegas, NV	59	1	1.7%	644,644	91.52	1.55
Louisville, KY	66	6	9.1%	620,118	106.43	9.68
Baltimore, MD	34	0	0.0%	602,495	56.43	0.00
Milwaukee, WI	61	0	0.0%	592,025	103.04	0.00
Albuquerque, NM	85	7	8.2%	560,218	151.73	12.50
Tucson, AZ	81	4	4.9%	545,975	148.36	7.33
Fresno, CA	21	0	0.0%	530,093	39.62	0.00
Mesa, AZ	44	2	4.5%	508,958	86.45	3.93
Sacramento, CA	50	8	16.0%	508,529	98.32	15.73

Sources: FARS 2018 ARF; Population – Census Bureau
Sorted by highest to lowest population.

Fatality Analysis Reporting System (FARS)

The Fatality Analysis Reporting System (FARS) contains data on every fatal traffic crash within the 50 States, the District of Columbia, and Puerto Rico. To be included in FARS, a crash must involve a motor vehicle traveling on a public trafficway and must result in the death of a vehicle occupant or a nonoccupant within 30 days of the crash. The Annual Report File (ARF) is the FARS data file associated with the most recent available year, which is subject to change when it is finalized about a year later. The final version of the file is aptly known as the Final file. The additional time between the ARF and the Final file provides the opportunity for submission of important variable data requiring outside sources, which may lead to changes in the final counts.

The updated final counts for a given previous calendar year will be reflected with the release of the recent year's ARF. For example, along with the release of the 2018 ARF, the 2017 Final file was also released to replace the previous year's 2017 ARF. The final fatality count in motor vehicle crashes for 2017 was 37,473, which was updated from 37,133 from the 2017 ARF. The number of pedalcyclist fatalities from the 2017 Final file was 806 which was updated from 783 from the 2017 ARF.

Crash Report Sampling System (CRSS) Replaces the National Automotive Sampling System (NASS) General Estimates System (GES)

NHTSA's National Center for Statistics and Analysis (NCSA) redesigned the nationally representative sample of police-reported traffic crashes, which estimates the number of police-reported injury and property-damage-only crashes in the United States. The new system, called CRSS, replaced NASS GES in 2016. For more information on CRSS, see the Additional Resources section of the CRSS web page at www.nhtsa.gov/crash-data-systems/crash-report-sampling-system-crss.

Methodology Change for Estimating People Injured

NCSA has changed the methodology of estimating people nonfatally injured in motor vehicle traffic crashes. The new approach is to combine people nonfatally injured from both FARS and NASS GES/CRSS. This is done by extracting people nonfatally injured in fatal crashes from FARS with people nonfatally injured in nonfatal injury crashes from NASS GES/CRSS. The old approach was to extract people injured from only NASS GES/CRSS by selecting people nonfatally injured in all crashes, regardless of crash severity. This change in methodology caused some estimates of people injured to change for some prior years.

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For More Information

Information on traffic fatalities is available from the National Center for Statistics and Analysis, NSA-230, 1200 New Jersey Avenue SE, Washington, DC 20590. NCSA can be contacted at 800-934-8517 or by e-mail at NCSARequests@dot.gov. General information on highway traffic safety can be found at www.nhtsa.gov/data. To report a safety-related problem or to inquire about motor vehicle safety information, contact the Vehicle Safety Hotline at 888-327-4236.

Other fact sheets available from the National Center for Statistics and Analysis are *Alcohol-Impaired Driving, Children, Large Trucks, Motorcycles, Occupant Protection in Passenger Vehicles, Older Population, Passenger Vehicles, Pedestrians, Rural/Urban Comparison of Traffic Fatalities, School-Transportation-Related Crashes, Speeding, State Alcohol-Impaired-Driving Estimates, State Traffic Data, Summary of Motor Vehicle Crashes,* and *Young Drivers.* Detailed data on motor vehicle traffic crashes are published annually in *Traffic Safety Facts: A Compilation of Motor Vehicle Crash Data*. The fact sheets and annual Traffic Safety Facts report can be found at https://crashstats.nhtsa.dot.gov/.

U.S. Department of Transportation
National Highway Traffic Safety Administration