2021

Pocket Guide to Large Truck and Bus Statistics

U.S. Department of Transportation
Federal Motor Carrier Safety Administration

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RRA-21-004
December 2021

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Introduction

The primary mission of the Federal Motor Carrier Safety Administration (FMCSA) is to reduce crashes, injuries, and fatalities involving large trucks and buses. In carrying out its safety mandate, FMCSA develops and enforces data-driven regulations that balance motor carrier safety with efficiency. For more information about the Agency and its safety-based initiatives, please visit www.fmcsa.dot.gov.

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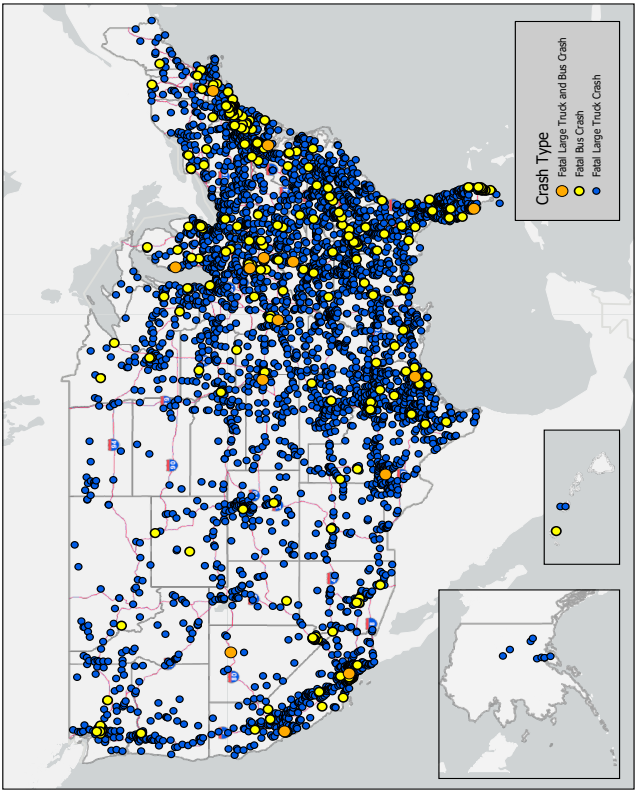
Locations of Fatal Large Truck and Bus Crashes, 2019



Note: In 2019, there were 4,696 fatal crashes involving large trucks and buses.
Data Source: National Highway Traffic Safety Administration (NHTSA), Fatality Analysis Reporting System (FARS).

The Motor Carrier Management Information System

FMCSA created and maintains the Motor Carrier Management Information System (MCMIS). MCMIS contains information on the safety performance of commercial motor carriers (large trucks and buses) and hazardous materials (HM) carriers subject to the Federal Motor Carrier Safety Regulations (FMCSRs) and Hazardous Materials Regulations (HMRs). This system contains crash, census, inspection, and investigation files created to monitor and develop safety standards for commercial motor vehicles (CMVs) operating in interstate commerce. The crash file includes information on all trucks and buses involved in reportable crashes. The census file includes descriptive information on every motor carrier in MCMIS and is updated weekly. FMCSA analyzes motor carrier self-reported MCMIS registration data and applies filters to identify and remove inaccurate entries to avoid over- or under-estimating values. The inspection file contains data from State and Federal inspection actions involving motor carriers operating in the United States. Most of the inspection data included in MCMIS are collected at the roadside by State personnel under the Motor Carrier Safety Assistance Program (MCSAP). The investigation file includes data from warning letters and on-site and off-site investigations and reviews conducted on motor carriers that transport property or passengers in interstate or intrastate commerce. Most of the investigation data is captured on-site during the examination of a motor carrier's operations by a safety investigator.

1. Overview: Large Trucks and Buses

In 2019, among the 276,491,174 total registered vehicles in the United States, 10,160,433 were single-unit trucks (straight trucks), 2,925,210 were combination trucks (tractor-trailers), and 995,033 were buses. Also in 2019, there were 3,261.8 billion vehicle miles traveled (VMT) by all motor vehicles. Large trucks traveled 300.1 billion of those miles (9.2 percent of the total), and buses traveled 18 billion of those miles (0.6 percent of the total).

FMCSA regulates all motor carriers that operate in interstate commerce, and certain requirements for motor carriers and commercial motor vehicles (CMVs) that transport hazardous materials (HM) in intrastate commerce. As of December 2020, 637,721 interstate motor carriers and intrastate HM motor carriers had recent activity operating in the United States:

- 373,238 were for-hire carriers
- 201,807 were private carriers
- 59,609 were both for-hire and private carriers
- 3,067 were neither for-hire nor private carriers (e.g., Government).

FMCSA regulates all drivers involved in interstate commerce, as well as all Commercial Driver's License (CDL) drivers, both interstate and intrastate. Approximately 6.5 million CMV drivers operate in the United States:

- 3.7 million operate interstate
  - 3.0 million operate interstate and hold CDLs
- 2.8 million operate intrastate
  - 1.0 million operate intrastate and hold CDLs.

Notes: The number of carriers and/or drivers in operation at any given time is subject to change, due to enforcement actions, business turnovers, licensing issues, and other factors. Interstate and some intrastate driver counts are based on motor carrier registration data contained in the Motor Carrier Management Information System (MCMIS); intrastate driver counts for States that do not require carriers to register with FMCSA were estimated by extrapolation from States requiring both interstate and intrastate carriers to register in MCMIS.
Data Sources: Registration Data - Federal Highway Administration (FHWA), *Highway Statistics 2019*; Carrier and CMV Driver Counts - FMCSA, MCMIS, data snapshot as of December 28, 2020.

1-1 Registered Vehicles in the United States, 2016-2019

Year	All Vehicles	Large Trucks	Buses
2016	268,799,083	11,498,561	976,161
2017	272,480,899	12,229,216	983,231
2018	273,602,100	13,233,910	992,152
2019	276,491,174	13,085,643	995,033

Data Source: Federal Highway Administration (FHWA), *Highway Statistics 2019*, Table VM-1.

1-2 Million Vehicle Miles Traveled (VMT) in the United States, 2016-2019

		Large Trucks		
Year	All Vehicles	Single-Unit	Combination	Buses
2016	3,174,408	113,338	174,557	16,350
2017	3,212,347	116,102	181,490	17,227
2018	3,240,327	120,699	184,165	18,303
2019	3,261,772	124,746	175,305	17,980

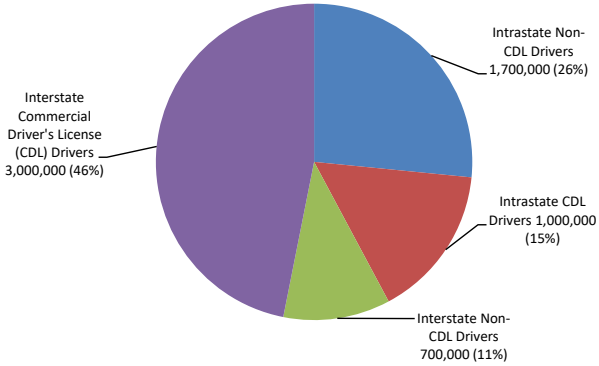
Data Source: Federal Highway Administration (FHWA), *Highway Statistics 2019*, Table VM-1.

1-3 Motorcoach Passenger Trips in the United States and Canada by Fleet Size, 2017

Motorcoach Fleet Size	Passenger Trips:		Average Passenger Trips per:	
	Total	Percent	Motorcoach	Carrier
100 or more	398,085,000	69.3%	45,314	19,904,251
50 to 99	31,373,100	5.5%	8,653	475,349
25 to 49	56,269,900	9.8%	18,891	541,057
10 to 24	33,736,400	5.9%	6,031	87,627
1 to 9	55,087,900	9.6%	3,384	21,018
Industry Total	**574,552,300**	**100.0%**	**15,418**	**179,772**

Note: Percentages may not sum to 100 percent because of rounding.
Data Source: *Motorcoach Census: A Study of the Size and Activity of the Motorcoach Industry in the United States and Canada in 2017.* Prepared for the American Bus Association Foundation by John Dunham & Associates, June 5, 2019. Available at www.buses.org/aba-foundation/research-summary/size-and-scope.

1-4 Commercial Motor Vehicle (CMV) Drivers Operating in the United States, 2020



Notes: The number of carriers and/or drivers in operation at any given time is subject to change, due to enforcement actions, business turnovers, licensing issues, and other factors. Interstate and some intrastate driver counts are based on motor carrier registration data contained in the Motor Carrier Management Information System (MCMIS); intrastate driver counts for States that do not require intrastate carriers to register with FMCSA are estimated via extrapolation of State data.

Data Source: FMCSA, MCMIS, data snapshot as of December 18, 2020.

1-5 Active Motor Carriers by Type, 2016-2020

Type	2016	2017	2018	2019	2020
Interstate Freight	497,349	515,772	541,231	555,567	590,249
Interstate Passenger	12,667	12,771	12,398	11,900	10,846
Intrastate Hazardous Materials	28,033	30,450	33,091	35,075	36,626
Total	**538,049**	**558,993**	**586,720**	**602,542**	**637,721**

Notes: The count of intrastate hazardous materials (HM) carriers includes a few active intrastate non-HM carriers with HM activity that meets the Safety Measurement System (SMS) HM threshold definition. Company counts are estimates based on motor carriers in the Motor Carrier Management Information System (MCMIS) with recent activity, defined as those carriers that have had an inspection, a crash, an investigation, a safety audit, an FMCSA Motor Carrier Identification Report (Form MCS-150) update, a vehicle registration activity, or a Unified Carrier Registration (UCR) system payment activity in the past 3 years, or have current operating authority indicated in the FMCSA Licensing and Insurance (L&I) database. Beginning on November 1, 2013, FMCSA's Unified Registration System (URS) rule requires all regulated entities to update their registration information every 24 months. The Agency deactivates the U.S. Department of Transportation (USDOT) number of any carrier that fails to comply with the biennial update requirement.

Data Source: FMCSA, MCMIS, data snapshots as of December 30, 2016; December 29, 2017; December 28, 2018; December 27, 2019; and December 18, 2020.

1-6 Active Hazardous Materials (HM) Carriers, 2016-2020

Active HM Carriers	2016	2017	2018	2019	2020
Interstate	70,556	75,350	76,131	80,810	84,226
Interstate HM Carriers Meeting SMS Threshold	7,420	7,388	7,261	7,218	6,563
Interstate HM Carriers with a Safety Permit (HMSP)*	1,144	1,128	883	843	827
Intrastate	28,033	30,450	33,091	35,075	36,626
Intrastate HM Carriers Meeting SMS Threshold	2,484	2,449	2,444	2,557	2,276
Intrastate HMSP*	178	174	160	157	142
*Total Active HMSP Carriers**	*1,322*	*1,302*	*1,043*	*1,000*	*969*
Total HM Carriers	**98,589**	**105,800**	**109,222**	**115,885**	**120,852**

*HMSP carriers are a subset of the total HM carrier population.
Note: The count of intrastate HM carriers includes a few active intrastate non-HM carriers with HM activity that meets the Safety Measurement System (SMS) threshold definition.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshots as of December 30, 2016; December 29, 2017; December 28, 2018; December 27, 2019; and December 18, 2020.

1-7 Household Goods Carriers and Brokers Operating in the United States, 2016-2020

Year	Active Household Goods Carriers	Household Goods Brokers Registered	Property Brokers Registered
2016	4,205	580	17,184
2017	4,394	671	17,966
2018	4,486	711	19,443
2019	4,666	878	20,892
2020	4,845	956	23,182

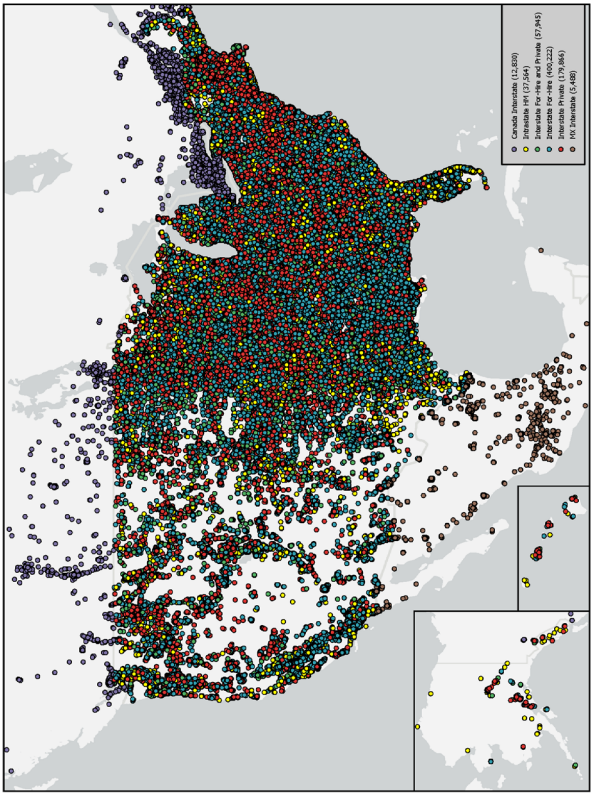
Note: A broker is an individual, partnership, or corporation that receives payment for arranging the transportation of property or household goods belonging to others by using an authorized motor carrier.
Data Source: FMCSA, Licensing & Insurance (L&I), data snapshots as of December 30, 2016; December 29, 2017; December 28, 2018; December 27, 2019; and December 18, 2020.

1-8 FMCSA-Regulated Carriers, 2016-2020

Motor Carrier Census Data	2016	2017	2018	2019	2020
Active Carriers with a USDOT Number	538,049	558,993	586,720	602,542	637,721
Power Units	4,381,344	4,517,800	4,650,605	4,788,339	4,899,374
CDL Drivers	3,331,966	3,556,342	3,615,957	3,634,989	3,765,320
Total Drivers	4,686,239	4,870,951	5,024,814	5,151,130	5,310,094

Notes: Compared to prior publications, total driver and CDL counts changed due to new filters being applied to exclude erroneous data in the motor carrier registration file. Only interstate carriers and intrastate HM carriers with recent activity are included in this table. FMCSA regulates all motor carriers that operate in interstate commerce, and certain requirements for motor carriers and commercial motor vehicles (CMVs) that transport HM in intrastate commerce. Beginning on November 1, 2013, FMCSA's Unified Registration System (URS) rule requires all regulated entities to update their registration information every 24 months. The Agency deactivates the USDOT number of any carrier that fails to comply with the biennial update requirement.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshots as of December 30, 2016; December 29, 2017; December 28, 2018; December 27, 2019; and December 18, 2020.

1-9 Carriers by Headquarters (Domicile) Location, 2020



Notes: Domicile refers to the headquarters location for a carrier. This map displays only interstate carriers and intrastate hazardous materials (HM) carriers. Intrastate non-HM carriers are not displayed. FMCSA regulates all motor carriers that operate in interstate commerce, and certain requirements for motor carriers and commercial motor vehicles (CMVs) that transport HM in intrastate commerce. The number of carriers depicted in this map may not be the same as reported elsewhere by FMCSA. Due to potential differences in reporting dates and quality issues with carrier addresses, this map may not include all current carriers. Additionally, the number of carriers that operate at any given time is subject to change due to enforcement actions, business turnover, and other factors.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of December 18, 2020.

1-10 FMCSA-Regulated Carriers by Domicile, 2020

Country	Active Carriers with a USDOT Number	Power Units	CDL Drivers	Total Drivers
United States	619,492	4,762,224	3,639,585	5,167,657
Canada	12,551	103,339	102,697	112,432
Mexico	5,349	31,002	22,812	28,773
Certificate Carriers	171	636	522	631
Commercial Zone Carriers	5,030	28,841	21,249	26,544
Enterprise Carriers	1,012	6,846	6,198	6,738
Long Haul Carriers	62	1,132	737	1,172
Other Countries	329	2,809	226	1,232
All Domiciles	**637,721**	**4,899,374**	**3,765,320**	**5,310,094**

Notes: U.S. domiciled carriers include carriers domiciled in the 50 U.S. States, the District of Columbia, and the U.S. territories. The sum of the Mexican carrier types may not sum to the total as some of the Mexican-owned carriers are domiciled in the United States. Only interstate carriers and intrastate hazardous materials (HM) carriers with recent activity are included in this table. FMCSA regulates all motor carriers that operate in interstate commerce, and certain requirements for motor carriers and commercial motor vehicles (CMVs) that transport HM in intrastate commerce. Beginning on November 1, 2013, FMCSA's Unified Registration System (URS) rule requires all regulated entities to update their registration information every 24 months. The Agency deactivates the USDOT number of any carrier that fails to comply with the biennial update requirement. A Mexican certificate carrier is a Mexico-domiciled motor carrier that transports exempt commodities or operates as a private motor carrier. These motor carriers were issued authority to operate trucks to points in the United States beyond the commercial zones. FMCSA stopped issuing these certificates in 2002. A Mexican commercial zone carrier is a Mexico-domiciled carrier that has authority to operate its trucks only within the U.S.-Mexico border commercial zones in the United States. A Mexican enterprise carrier is a Mexican-owned or controlled carrier that is domiciled in the United States and operates in the United States, conducting cross-border transportation of international cargo that originates in or is destined for a foreign country. A Mexican long-haul carrier is a Mexico-domiciled carrier that has authority to engage in long-haul transportation in the United States as a motor carrier of property (except household goods and placardable HM) in interstate commerce in or beyond the border commercial zones. The authority does not allow point-to-point transportation services within the United States for goods other than international cargo. Reports include activity for all U.S. operations from the date the carrier was first allowed to operate up through the date of the current data snapshot.

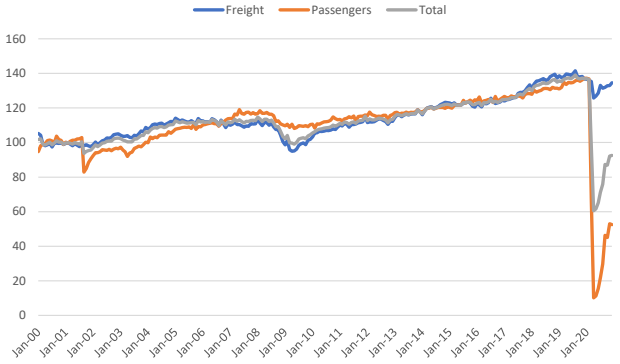
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of December 18, 2020.

1-11 FMCSA-Regulated Carriers by Number of Power Units, 2016-2020

Power Units	2016	2017	2018	2019	2020
1 Power Unit	249,972	261,116	278,448	289,408	317,791
2 Power Units	93,596	95,979	99,221	101,044	104,620
3–10 Power Units	139,549	143,248	147,710	149,225	150,545
11–100 Power Units	47,117	48,515	50,075	51,211	52,121
>100 Power Units	4,176	4,282	4,396	4,572	4,604
No Power Units/Unreported	3,639	5,853	6,870	7,082	8,040
Total	**538,049**	**558,993**	**586,720**	**602,542**	**637,721**

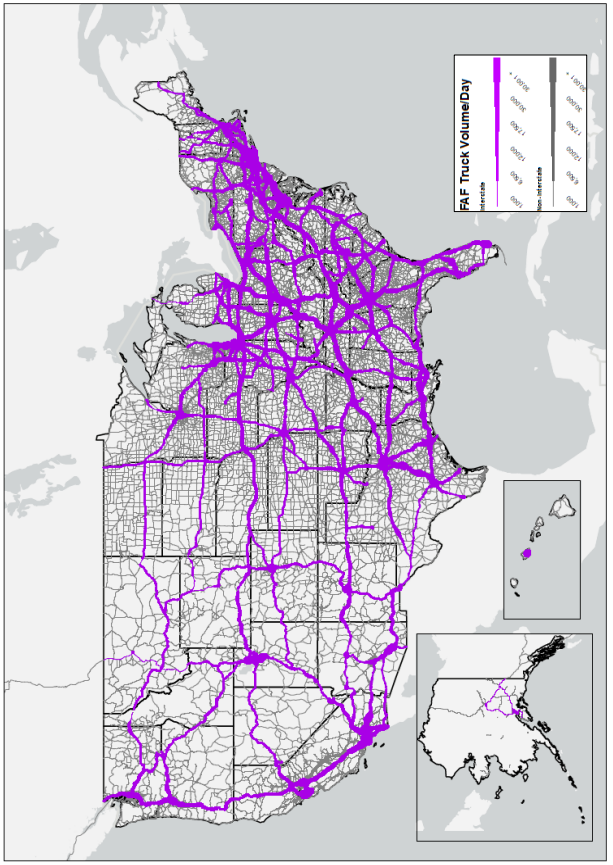
Only interstate carriers and intrastate hazardous materials (HM) carriers with recent activity are included in this table. FMCSA regulates all motor carriers that operate in interstate commerce, and certain requirements for motor carriers and commercial motor vehicles (CMVs) that transport HM in intrastate commerce. Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshots as of December 30, 2016; December 29, 2017; December 28, 2018; December 27, 2019; and December 18, 2020.

1-12 Transportation Services Index (TSI) Freight and Passenger Movement Estimates, 2000-2020



Notes: The Transportation Services Index (TSI), created by the U.S. Department of Transportation (USDOT), Bureau of Transportation Statistics (BTS), measures the movement of freight and passengers. The index, which is seasonally adjusted and updated monthly, combines available data on freight traffic, as well as passenger travel, that have been weighted to yield a monthly measure of transportation services output. TSI numbers are BTS estimates. The index numbers for the latest 3 months are considered to be preliminary. BTS releases the preliminary number for the latest month and replaces the number for the oldest preliminary month with a revised number. Seasonal adjustment models for the modal data have been updated for the data from January 2000 to the present.
Data Source: USDOT, BTS, TSI, available at https://www.transtats.bts.gov/OSEA/TSI/ as of April 19, 2021.

1-13 Average Daily Truck Traffic on the National Highway System, 2012



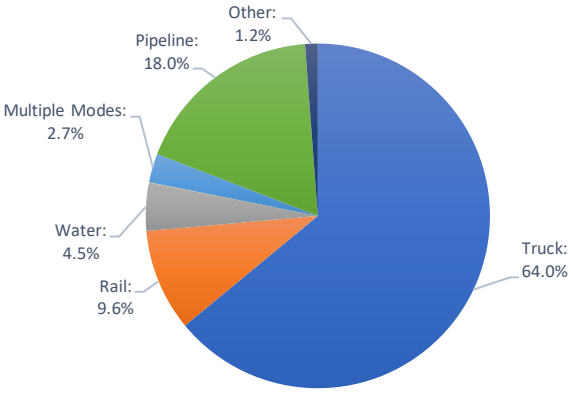
Notes: In this map, both private and for-hire trucks are included. Trucks that are used in movements for multiple modes and mail, or that move in conjunction with domestic air cargo, are excluded. For more information on Freight Analysis Framework (FAF) mode classes, refer to: https://www.bts.gov/archive/subject_areas/freight_transportation/faf/users_guide/.
Data Source: Federal Highway Administration, Office of Freight Management and Operations, FAF, Version V2016.09 as of April 2017

1-14 Weight of Freight Shipped within the United States by Mode (in Millions of Tons), 2014-2018

Mode	2014	2015	2016	2017	2018
Truck	11,257	11,391	11,595	11,599	11,920
Rail	1,891	1,797	1,704	1,750	1,782
Water	748	737	734	780	838
Air*	5	5	5	6	6
Multiple Modes & Mail	491	487	484	495	504
Pipeline	2,950	2,985	2,959	3,062	3,346
Other**	248	247	241	244	221
Total	**17,590**	**17,649**	**17,722**	**17,936**	**18,617**

*Includes air and truck-air.
**Includes other, unknown, and no domestic mode.
Note: Includes domestic trade and the domestic portion of imports and exports.
Data Sources: U.S. Department of Transportation, Bureau of Transportation Statistics and Federal Highway Administration, Freight Analysis Framework, version 4.5.1, as of May 2020, available at http://faf.ornl.gov.

1-15 Percent of Total Weight of Freight Moved by Mode, 2018



Notes: Includes domestic trade and the domestic portion of imports and exports. Air accounts for 0.03 percent of total domestic freight and is excluded from this chart. Percentages may not sum to 100 percent due to rounding.
Data Sources: U.S. Department of Transportation, Bureau of Transportation Statistics and Federal Highway Administration, Freight Analysis Framework, version 4.5.1, as of May 2020, available at http://faf.ornl.gov.

1-16 Driver and Passenger Safety Belt Usage by Commercial Motor Vehicle (CMV) Body Type, 2010, 2013, and 2016

Driver and Other Occupant Group	2010	2013	2016
Buses			
Commercial Bus	47.0%	74.4%	65.4%
School Bus	81.7%	85.9%	91.9%
15-Passenger Van	-	-	96.2%
Mini Bus	87.9%	86.3%	88.8%
Transit Bus	-	-	53.4%
Large Trucks			
Bobtail	70.9%	86.2%	84.8%
Intermodal Container	75.3%	81.5%	92.6%
Dump	64.5%	69.3%	77.7%
Flatbed	74.0%	81.9%	82.2%
Van (Enclosed Box Truck)	80.2%	85.7%	87.4%
Tanker	82.5%	85.3%	87.9%
Other	73.3%	80.9%	84.7%

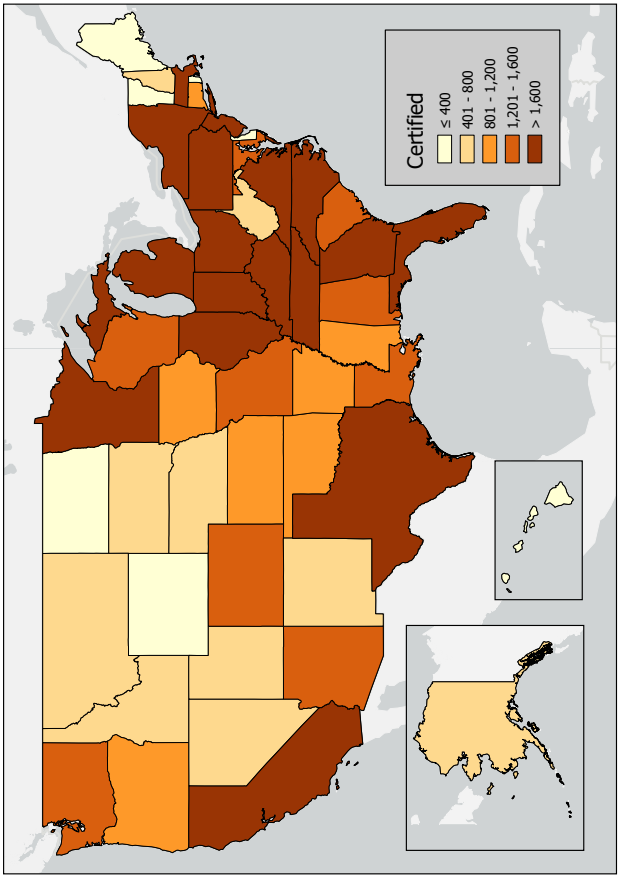
Notes: Prior to 2016, the body type "15-Passenger Van" was captured in the "Mini Bus" category. "Transit Bus" was included as a category for the first time in 2016. The Seat Belt Use by Commercial Motor Vehicle Drivers (SBUCMVD) Survey is conducted every 3 years. In 2016, a total of 39,319 commercial motor vehicles, 39,319 drivers, and 2,451 other occupants were observed at 1,008 sites. Only driver belt use is observed for buses (for the purpose of this study, 15-passenger vans are counted as buses). "Other occupants" are right-front passengers.
Data Source: FMCSA, SBUCMVD 2016 Survey. For more information, refer to: http://www.fmcsa.dot.gov/safety/safety-belt/safety-belt-studies.

1-17 CMV Driver and Passenger Safety Belt Usage by Occupant Type, 2010, 2013, and 2016

Occupant Type	2010	2013	2016
All Occupants	77.1%	83.0%	84.9%
Drivers	78.1%	83.7%	86.1%
Other Occupants	64.0%	72.9%	69.8%

Notes: The Seat Belt Use by Commercial Motor Vehicle Drivers (SBUCMVD) Survey is conducted every 3 years. In 2016, a total of 39,319 commercial motor vehicles, 39,319 drivers, and 2,451 other occupants were observed at 1,008 sites. Only driver belt use is observed for buses (for the purpose of this study, 15-passenger vans are counted as buses). "Other occupants" are right-front passengers.
Data Source: FMCSA, SBUCMVD 2016 Survey. For more information, refer to: http://www.fmcsa.dot.gov/safety/safety-belt/safety-belt-studies.

1-18 Number of Medical Examiners Certified by State, 2021



Sources: Esri, HERE, Garmin, FAO, NOAA,

Notes: In April 2021, there were 76,396 medical examiners certified on the National Registry of Certified Medical Examiners (National Registry). If a medical examiner has multiple offices in the same State, the examiner is counted once. However, if a medical examiner has a business office in two or more States, the examiner will be counted once in each State.
Data Source: FMCSA, National Registry, April 27, 2021. Available at https://nationalregistry.fmcsa.dot.gov.

2. Inspections and Violations

What is an Inspection?

An inspection is an examination of an individual commercial motor vehicle (CMV) and/or driver by an authorized safety inspector. State inspectors conduct approximately 95 percent of inspections, with the remainder conducted by Federal inspectors. The inspection determines whether the driver and/or the CMV is in compliance with the Federal Motor Carrier Safety Regulations (FMCSRs) or the Hazardous Materials Regulations (HMRs), as appropriate. Serious violations result in the issuance of vehicle or driver out-of-service (OOS) orders. These violations must be corrected before the affected driver or vehicle can return to service.

2-1 Inspections Conducted by Federal and State Inspectors, 2016-2020

	2016	2017	2018	2019	2020
Inspections	3,401,103	3,457,130	3,515,954	3,469,717	2,570,280
State	3,280,166	3,334,891	3,390,262	3,361,353	2,545,582
Federal	120,937	122,239	125,692	108,364	24,698

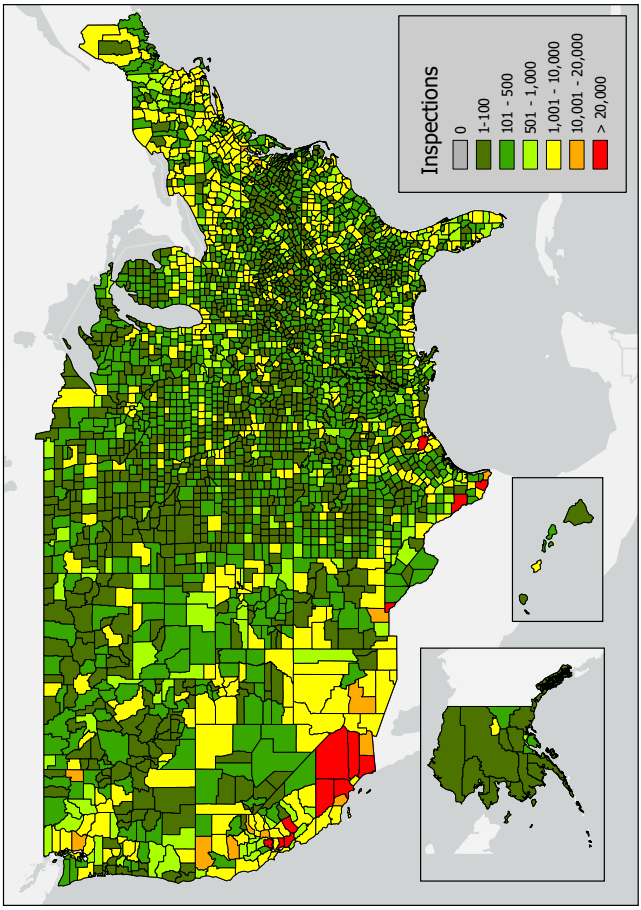
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-2 Safety Inspectors, Federal and State, 2016-2020

Inspector Type	2016	2017	2018	2019	2020
Safety Inspectors	14,830	14,182	13,839	13,588	12,760
State	14,321	13,657	13,320	13,080	12,401
Federal	509	525	519	508	359

Note: Not all personnel indicated are assigned full-time to conducting inspections.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-3 Inspections by County, 2020



Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 31, 2021.

2-4 Inspection Out-of-Service (OOS) Rates, 2016-2020

Type of Inspection	2016	2017	2018	2019	2020
Driver Inspections*	3,283,556	3,344,956	3,402,946	3,353,735	2,460,580
With OOS Violation	161,111	170,843	161,203	170,874	129,442
Driver OOS Rate	4.9%	5.1%	4.7%	5.1%	5.3%
Vehicle Inspections**	2,337,164	2,382,217	2,410,876	2,384,413	1,759,961
With OOS Violation	466,839	493,581	501,729	492,129	364,598
Vehicle OOS Rate	20.0%	20.7%	20.8%	20.6%	20.7%
Hazmat Inspections***	201,309	200,067	202,077	202,912	149,805
With OOS Violation	7,930	7,935	8,437	9,150	6,557
Hazmat OOS Rate	3.9%	4.0%	4.2%	4.5%	4.4%

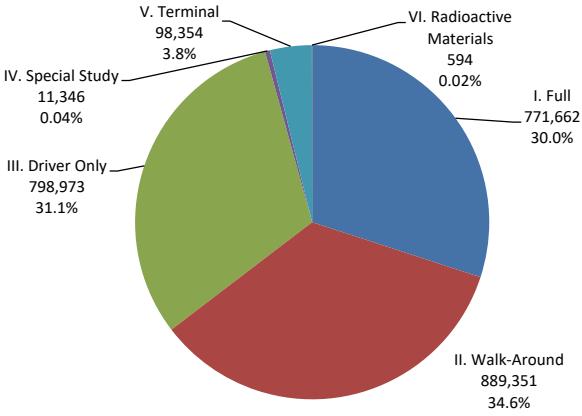
*Driver Inspections were computed based on inspection levels I, II, III, and VI.
**Vehicle Inspections were computed based on inspection levels I, II, V, and VI.
***Hazmat Inspections were computed based on inspection levels I, II, III, IV, V, and VI when hazardous materials were present.
Notes: Inspection OOS rates depicted in this table include both large trucks and buses. Counts in this table include Federal and State inspections. For more information on inspections and inspection levels, please refer to http://cvsa.org/inspections/inspections/all-inspection-levels/.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-5 Inspections by Level, 2016-2020

Inspection Level	2016	2017	2018	2019	2020
I. Full	1,013,253	1,039,143	1,104,938	1,069,471	771,662
With OOS Violation(s)*	252,221	266,480	278,174	266,595	191,625
II. Walk-Around	1,217,351	1,237,851	1,202,248	1,208,460	889,351
With OOS Violation(s)*	269,558	285,232	280,165	285,658	217,833
III. Driver Only	1,052,708	1,067,350	1,094,817	1,074,811	798,973
With OOS Violation(s)*	64,117	65,297	55,528	58,498	43,772
IV. Special Study	11,231	7,563	10,261	10,493	11,346
With OOS Violation(s)*	2,079	1,596	1,998	1,753	1,842
V. Terminal	106,316	104,611	102,747	105,489	98,354
With OOS Violation(s)*	6,184	5,837	5,722	5,862	4,516
VI. Radioactive Materials	244	612	943	993	594
With OOS Violation(s)*	11	13	5	8	5
Total	**3,401,103**	**3,457,130**	**3,515,954**	**3,469,717**	**2,570,280**

*Out-of-service (OOS) violation numbers are based on inspections. For example, in 2020, there were 771,662 Level I inspections. Out of all the Level I inspections completed, 191,625 resulted in *at least one* OOS violation.
Note: For more information on inspections and inspection levels, please refer to http://cvsa.org/inspections/inspections/all-inspection-levels/.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-6 Inspections by Level, 2020



Note: For more information on inspections and inspection levels, please refer to http://cvsa.org/inspections/inspections/all-inspection-levels/.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-7 Inspections by Carrier Fleet Size, 2016-2020

Carrier Fleet Size	2016	2017	2018	2019	2020
Very Small (1-6 Power Units)	1,070,118	1,096,781	1,118,490	1,090,273	823,135
Small (7-20 Power Units)	598,280	605,352	614,298	610,541	441,460
Medium (21-100 Power Units)	725,612	733,737	737,394	728,794	531,871
Large (>100 Power Units)	853,350	878,085	895,320	891,735	679,554
Unknown	153,743	143,175	150,448	148,374	94,260
Total	**3,401,103**	**3,457,130**	**3,515,950**	**3,469,717**	**2,570,280**

Note: Carriers listed as having zero power units are included in the "Unknown" category.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-8 Inspections by Carrier Operation, 2016-2020

Carrier Operation	2016	2017	2018	2019	2020
Interstate	2,777,374	2,808,415	2,794,424	2,766,763	2,029,951
Intrastate	623,729	648,715	721,530	702,954	540,329
Total	**3,401,103**	**3,457,130**	**3,515,954**	**3,469,717**	**2,570,280**

Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-9 Inspections by Gross Combination Weight Rating (GCWR), 2016-2020

GCWR	2016	2017	2018	2019	2020
<10,000 pounds	16,743	16,613	15,657	15,087	9,285
10,000 - 26,000 pounds	470,646	494,965	547,994	561,200	449,281
>26,000 pounds	2,735,246	2,816,227	2,829,302	2,775,774	2,007,230
Unknown	178,468	129,325	123,001	117,656	104,484
Total	**3,401,103**	**3,457,130**	**3,515,954**	**3,469,717**	**2,570,280**

Note: GCWRs are based on Inspection Reports as reported in MCMIS.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-10 Most Frequent Driver Violations in Inspections, 2020

Violation Code	Category	Violation Description	Number of Violations
392.2SLLS2	Traffic Enforcement	State/Local Laws - Speeding 6-10 miles per hour over the speed limit.	58,134
392.2C	Traffic Enforcement	Failure to obey traffic control device	49,454
392.16	Seat Belt	Failing to use seat belt while operating a CMV	45,397
395.8E	No Log/Log Not Current	False report of drivers record of duty status	35,056
392.2LV	Traffic Enforcement	Lane Restriction violation	33,022
395.8	No Log/Log Not Current	Record of Duty Status violation (general/form and manner)	32,577
383.23A2	All Other Driver Violations	Operating a CMV without a CDL	32,538
392.2SLLS3	Traffic Enforcement	State/Local Laws - Speeding 11-14 miles per hour over the speed limit.	29,327
391.41AF	Medical Certificate	Operating a property-carrying vehicle without possessing a valid medical certificate.	27,381
395.8AELD	No Log/Log Not Current	ELD - No record of duty status (ELD Required)	26,227
391.41A	Medical Certificate	No medical certificate in driver's possession	25,635
392.2SLLS4	Traffic Enforcement	State/Local Laws - Speeding 15 or more miles per hour over the speed limit.	20,021
395.24D	No Log/Log Not Current	ELD cannot transfer ELD records electronically	19,796
395.22H4	No Log/Log Not Current	Driver failed to maintain supply of blank drivers records of duty status graph-grids	16,342
395.22H2	No Log/Log Not Current	Driver failing to maintain ELD instruction sheet	16,332
395.8F01	No Log/Log Not Current	Drivers record of duty status not current	16,179
395.22G	All Other Driver Violations	Portable ELD not mounted in a fixed position and visible to driver	15,768
392.82A1	All Other Driver Violations	Using a hand-held mobile telephone while operating a CMV	14,634
395.22H1	No Log/Log Not Current	Driver failing to maintain ELD user's manual	13,261
395.24C2III	All Other Driver Violations	Driver failed to manually add shipping document number	12,515

Notes: Total number of driver inspections in 2020: 2,460,580. Total number of driver violations in 2020: 765,526. Total number of driver out-of-service (OOS) violations in 2020: 151,145. Only the top 20 driver violations (based on frequency of occurrence) are listed in this table.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-11 Most Frequent Vehicle Violations in Inspections, 2020

Violation Code	Category	Violation Description	Number of Violations
393.9	Lighting	Inoperable Required Lamp	311,791
396.17C	Periodic Inspection	Operating a CMV without proof of a periodic inspection	136,106
393.47E	Brakes	Clamp or Roto type brake out-of-adjustment	113,386
393.95A	Emergency Equipment	No/discharged/unsecured fire extinguisher	99,321
396.3A1	All Other Vehicle Defects	Inspection, repair and maintenance of parts and accessories	90,580
393.9TS	Lighting	Inoperative turn signal	88,361
393.11	Lighting	No or defective lighting devices or reflective material as required	80,162
393.75A3	Tires	Tire-flat and/or audible air leak	70,584
393.75C	Tires	Tire-other tread depth less than 2/32 of inch measured in a major tread groove	69,656
393.78	Windshield	Windshield wipers inoperative/defective	64,711
393.53B	Brakes	CMV manufactured after 10/19/94 has an automatic airbrake adjustment system that fails to compensate for wear	62,932
396.5B	All Other Vehicle Defects	Oil and/or grease leak	57,441
393.95F	Emergency Equipment	No / insufficient warning devices	51,584
396.3A1BOS	Brakes	Brakes Out Of Service: The number of defective brakes is equal to or greater than 20 percent of the service brakes on the vehicle or combination	45,465
393.48A	Brakes	Inoperative/defective brakes	44,629
393.9H	Lighting	Inoperable head lamps	44,471
393.45B2	Brakes	Brake hose or tubing chafing and/or kinking	43,704
393.55E	Brakes	No or Defective ABS Malfunction Indicator Lamp for trailer manufactured after 03/01/1998	42,870
396.3A1B	Brakes	Brakes (general)	40,383
393.60C	Windshield	Damaged or discolored windshield	34,858

Notes: Total number of vehicle inspections in 2020: 1,759,961. Total number of vehicle violations in 2020: 2,543,126. Total number of vehicle out-of-service violations in 2020: 549,413. Only the top 20 vehicle violations (based on frequency of occurrence) are listed in this table.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-12 Traffic Enforcement Inspections, 2016-2020

Activity Summary	2016	2017	2018	2019	2020
Number of Traffic Enforcement Inspections (Driver observed)	314,049	328,866	350,102	353,646	291,579
With Moving Violations	310,685	325,186	345,943	349,427	288,086
With Drug & Alcohol Violations	4,160	4,679	5,365	5,493	4,273
With Railroad Crossing Violations	218	223	210	252	183
Number of Traffic Enforcement Inspections (Vehicle observed)	234,651	223,944	217,400	237,167	197,204
Total Number of Traffic Enforcement Inspections	**548,700**	**552,810**	**567,501**	**590,813**	**488,783**

Notes: One inspection may result in more than one violation; therefore, totals may not equal the sum of all components. The traffic enforcement program involves the enforcement of 26 moving and non-moving driver violations, which are included in the driver violation portion of the inspection procedures. As of January 2017, two new traffic enforcement violations were added: "driving a commercial motor vehicle (CMV) while texting" and "using a hand-held mobile telephone while operating a CMV." These violations are included in the moving violations category.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

2-13 Traffic Enforcement Violations, 2016-2020

Activity Summary	2016	2017	2018	2019	2020
Number of Traffic Enforcement Violations (Driver observed)	337,098	354,488	378,827	384,212	316,520
Moving Violations	331,962	348,691	372,043	377,138	310,788
Drug & Alcohol Violations	4,917	5,573	6,573	6,821	5,181
Railroad Crossing Violations	219	224	211	253	184
Number of Traffic Enforcement Violations (Vehicle observed)	450,827	437,138	426,697	470,692	405,317
Total Number of Traffic Enforcement Violations	**787,925**	**791,626**	**805,524**	**854,904**	**721,837**

Notes: The traffic enforcement program involves the enforcement of 26 moving and non-moving driver violations, which are included in the driver violation portion of the inspection procedures. Inspections that result in drug- or alcohol-related violations are included as traffic enforcement type inspections if another moving violation is present. As of January 2017, two new traffic enforcement violations were added: "driving a commercial motor vehicle (CMV) while texting" and "using a hand-held mobile telephone while operating a CMV." These violations are included in the moving violations category.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

3. Investigations

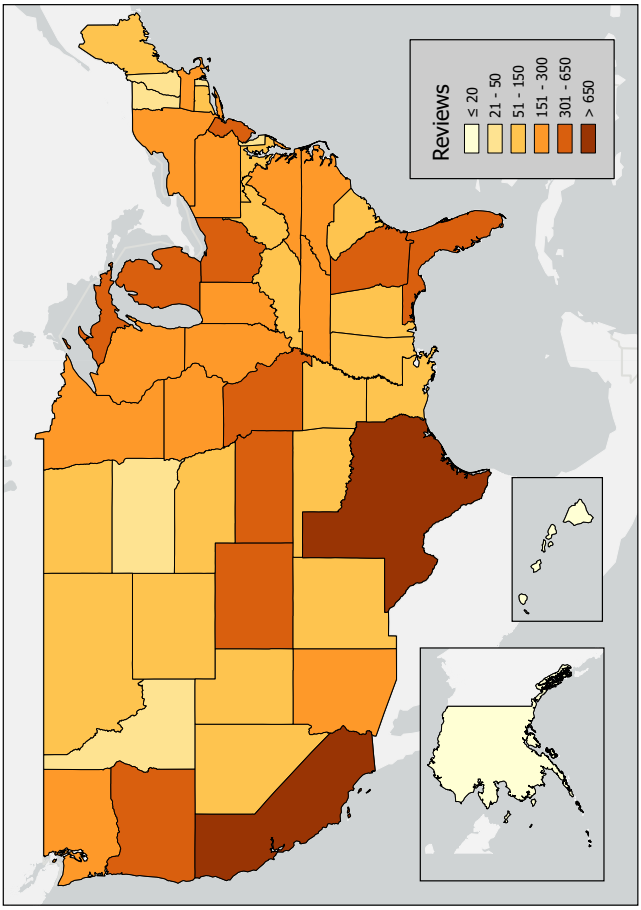
This chapter provides summarized data for the past 5 years on all types of investigations and reviews conducted on motor carriers that transport property or passengers in interstate or intrastate commerce. Investigations are conducted to investigate identified areas of non-compliance and safety concerns, with a focus on carriers identified as high risk; to investigate complaints; or in response to other safety and compliance concerns. It is intended that through education, heightened safety regulation awareness, and the enforcement effects of investigations, motor carriers will improve the safety of their commercial vehicle operations and, ultimately, reduce their involvement in crashes.

The Compliance, Safety, Accountability (CSA) program is FMCSA's enforcement model to focus the Agency's efforts on large truck and bus safety and to prevent crashes, injuries, and fatalities related to commercial motor vehicles (CMVs). This program has introduced an enforcement and compliance model that allows FMCSA and its State partners to contact more carriers earlier in order to address safety deficiencies before crashes occur. The CSA program provides a nationwide system for making the roads safer for motor carriers and the public alike.

Companies investigated by FMCSA include, but are not limited to: trucking companies, household goods moving companies, bus companies, cargo tank facilities, and hazardous materials shippers.

For more statistics on investigations, please refer to: http://ai.fmcsa.dot.gov/SafetyProgram/Review.aspx.

3-1 Investigations by State, 2020



Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 31, 2021.

3-2 Investigations Conducted by Federal and State Investigators, 2016-2020

Investigations	2016	2017	2018	2019	2020
State	6,320	6,460	6,048	5,376	4,396
Federal	7,762	8,584	8,174	7,661	7,037
Total	**14,082**	**15,044**	**14,222**	**13,037**	**11,433**

Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

3-3 Interventions by Type, 2016-2020

Intervention Type	2016	2017	2018	2019	2020
Investigations	14,082	15,044	14,222	13,037	11,433
Onsite Comprehensive	6,080	6,440	5,883	5,358	1,968
Onsite Focused	6,907	7,675	7,418	5,936	3,596
Offsite	118	76	330	1,374	5,753
Cargo Tank Facility Reviews	82	131	92	82	27
Shipper Reviews	169	40	12	7	2
Non-Rated Reviews	742	697	502	292	88
Warning Letters	35,756	28,508	30,150	26,564	22,230
Security Contact Reviews	532	426	349	344	164
Totral Terminal Investigations	5,799	15,296	20,439	24,996	23,485

Notes: Warning letters are based on a Safety Measurement System (SMS) algorithm that was implemented nationally in December of 2010.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

3-4 FMCSA-Regulated Carriers by Safety Rating, 2020

Safety Rating	Interstate Freight Carriers	Intrastate HM Carriers	Interstate Passenger Carriers	All Carriers
Conditional	12,035	529	191	12,755
Satisfactory	32,544	1,801	2,755	37,100
Unsatisfactory	986	115	12	1,113
No Rating	526,921	34,144	7,459	568,524
Total	**572,486**	**36,589**	**10,417**	**619,492**

Note: In order to receive a safety rating, a carrier must have received a compliance review or comprehensive onsite investigation.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of December 18, 2020.

3-5 Passenger Carrier, Hazardous Materials Carrier, and Household Goods Carrier Investigations, 2016-2020

Carriers by Vehicle Type	2016	2017	2018	2019	2020
Any Passenger Vehicles*	1,324	1,552	1,166	1,162	399
Motorcoaches	984	1,199	915	964	227
School Buses	168	186	176	315	107
Vans	302	348	281	160	91
Mini Buses	417	541	390	178	70
Limousines	140	116	100	219	80
Hazardous Materials	808	643	524	560	439
Household Goods	177	181	172	135	62

*The "Any Passenger Vehicles" row might not equal the sum of subcategories for a given row due to carriers applying for multiple passenger authority at the time of the application.
Notes: Passenger carriers were those carriers that registered to transport passengers and owned or leased at least one passenger vehicle (motorcoach, school bus, van, mini-bus, or limousine). Beginning in 2014, reporting criteria for identifying passenger carrier investigations was updated. As a result, data may differ from previous versions. Passenger carrier investigations now reflect investigations performed by Federal and State personnel on motor carriers that were subject to the Safety Measurement System (SMS) passenger carrier threshold at the time of the investigations.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

3-6 Investigations by Carrier Fleet Size, 2016-2020

Carrier Fleet Size	2016	2017	2018	2019	2020
Very Small (1-6 Power Units)	8,181	8,976	8,465	7,498	6,131
Small (7-20 Power Units)	3,593	3,741	3,615	3,425	3,243
Medium (21-100 Power Units)	1,720	1,836	1,709	1,663	1,696
Large (>100 Power Units)	348	335	344	374	332
No Power Units/Unreported	240	156	89	77	31
Total	**14,082**	**15,044**	**14,222**	**13,037**	**11,433**

Note: Carriers listed as having zero power units are included in the "No Power Units/Unreported" category.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

3-7 New Entrant Safety Audits, 2016-2020

Year	Safety Audits	Safety Audit Pass Rate
2016	37,548	88.6%
2017	36,214	89.8%
2018	37,348	89.3%
2019	40,276	88.2%
2020	40,129	92.6%

Notes: A new entrant is a motor carrier that applies for a USDOT number in order to initiate operations in interstate commerce or the intrastate transportation of hazardous materials (HM). Carriers remain in the New Entrant Safety Assurance Program until they pass the safety audit and have been in business for 18 months. For more information on the New Entrant Safety Assurance Program, visit http://www.fmcsa.dot.gov/safety/new-entrant-safety-assurance-program.
Data Source: FMCSA, Motor Carrier Management Information System (MCMIS), data snapshot as of January 29, 2021.

3-8 Summary of Closed Enforcement Cases, 2016-2020

Subject Type	2016 Cases (Amount Settled)	2017 Cases (Amount Settled)	2018 Cases (Amount Settled)	2019 Cases (Amount Settled)	2020 Cases (Amount Settled)
Broker	0 ($0)	0 ($0)	0 ($0)	0 ($0)	0 ($0)
Cargo Tank Facility	27 ($732,110)	35 ($938,720)	25 ($593,650)	15 ($118,830)	9 ($12,288,560)
Carrier	4,309 ($32,493,395)	4,617 ($33,288,715)	4,125 ($29,116,929)	3,498 ($22,453,405)	2,404 ($14,601,314)
Drug Consortium	0 ($0)	0 ($0)	0 ($0)	1 ($5,890)	0 ($0)
Freight Forwarder	79 ($901,410)	64 ($922,352)	70 ($955,874)	41 ($416,212)	11 ($59,700)
HM Carrier	144 ($1,908,390)	166 ($2,341,200)	139 ($1,673,220)	121 ($1,161,700)	54 ($405,289)
HM Carrier (Not Placarded)	0 ($0)	0 ($0)	0 ($0)	0 ($0)	1 ($3,110)
HM Carrier/ Shipper	147 ($1,561,249)	107 ($1,407,510)	80 ($963,390)	52 ($575,100)	25 ($287,780)
Other	3 ($28,300)	3 ($15,360)	4 ($16,716)	3 ($19,640)	0 ($0)
Passenger Carrier	185 ($1,726,254)	206 ($1,779,542)	92 ($972,746)	63 ($449,133)	34 ($217,650)
Shipper	3 ($30,790)	5 ($41,650)	2 ($30,110)	0 ($0)	0 ($0)
Small Passenger Carrier	0 ($0)	0 ($0)	0 ($0)	0 ($0)	0 ($0)
Total	**4,897 ($39,381,898)**	**5,203 ($40,735,049)**	**4,537 ($34,322,635)**	**3,794 ($25,199,910)**	**2,538 ($27,863,403)**

Notes: FMCSA is responsible for ensuring full compliance with all Federal Motor Carrier Safety Regulations (FMCSRs) and Hazardous Materials Regulations (HMRs) required of large truck and bus companies regulated by the U.S. Department of Transportation (USDOT). This table provides data for 5 calendar years of enforcement cases considered "closed" for large truck and bus companies regulated by the USDOT. An enforcement case is deemed "closed" once FMCSA issues a carrier a "Notice of Claim" (NOC) and the carrier has (1) paid the penalty in full, (2) signed a settlement agreement, (3) defaulted on the NOC, upon which a "Final Agency Order" is issued, or (4) found liable for violations charged in the NOC after adjudication.

Data Sources: FMCSA, Motor Carrier Management Information System (MCMIS), Enforcement Management Information System (EMIS), January 29, 2021.

4. Crashes

In 2019, of the 33,244 fatal crashes on the Nation's roadways, 4,696 (14.1 percent) involved at least one large truck or bus. In addition, there were an estimated 6,722,000 nonfatal crashes, 575,000 (8.6 percent) of which involved at least one large truck or bus. For more information on large truck and bus crashes, please refer to the annual *Large Truck and Bus Crash Facts* publication available at http://www.fmcsa.dot.gov/safety/data-and-statistics/large-truck-and-bus-crash-facts.

Data Sources:

FARS: Maintained by the National Highway Traffic Safety Administration (NHTSA), the Fatality Analysis Reporting System (FARS) is an annual census of fatal crashes involving motor vehicles traveling on public trafficways. Beginning with data for 2016, the National Highway Traffic Safety Administration (NHTSA) implemented changes to revise vehicle classification based on gross vehicle weight rating (GVWR), which reclassified 329 light pickup trucks as large trucks. Due to this methodology change, comparisons of the 2016 (and later) FARS large truck data with prior years should be performed with caution. For more information on FARS, refer to http://www.nhtsa.gov/FARS.

CRSS: NHTSA established the Crash Report Sampling System (CRSS) in 2016 when the long-running General Estimates System (GES) was retired. CRSS is a sample of police-reported crashes involving all types of motor vehicles, pedestrians, and cyclists, ranging from property-damage-only crashes to those that result in fatalities. CRSS is used to estimate the overall crash picture, identify highway safety problem areas, measure trends, inform consumer information initiatives, and support cost and benefit analyses of highway safety initiatives and regulations. The data from CRSS yield national estimates through a weighting procedure but cannot give State-level estimates. Because CRSS is a sample of motor vehicle crashes, the results generated are estimates rounded to the nearest 1000; however, associated percentages and rates are based on the unrounded data. To learn more about CRSS, visit https://www. nhtsa.gov/national-center-statistics-and-analysis-ncsa/crash-report-sampling-system-crss#crash-report-sampling-system-crss-data-files.

MCMIS: Maintained by FMCSA, the Motor Carrier Management Information System (MCMIS) Crash File contains data on commercial trucks and buses in fatal, injury, and towaway crashes (crashes in which at least one vehicle is disabled as a result of the crash and transported away from the crash scene). Crash severity thresholds and vehicle type definitions in MCMIS differ slightly from those in FARS and GES/CRSS, and all tables are noted accordingly.

All MCMIS crash data presented are considered preliminary for 22 months. For more information on MCMIS, refer to https://ask.fmcsa.dot.gov/app/mcmiscatalog/mcmishome.

NHTSA Crash Severity Levels:

This Pocket Guide includes data on police-reported crashes collected by NHTSA, which include fatal, injury, and property-damage-only (PDO) crashes.

1. **Fatal crashes** include police-reported crashes involving a motor vehicle in transport on a trafficway in which at least one person dies within 30 days of the crash. The fatality does not have to occur at the scene of the crash and includes any person involved, including non-motorists.

2. **Injury crashes** include police-reported crashes involving a motor vehicle in transport on a trafficway in which no one died but at least one person was reported to have: (1) an incapacitating injury; (2) a visible but not incapacitating injury; (3) a possible, not visible injury; or (4) an injury of unknown severity.

3. **PDO crashes** include police-reported crashes involving a motor vehicle in transport on a trafficway in which no one involved in the crash suffered any injuries.

For more information on crash severity levels, refer to NHTSA's National Center for Statistics and Analysis (NCSA) Data Resource Web site at: https://crashstats.nhtsa.dot.gov/#/.

Vehicles in Crashes:

Large Trucks: FARS and GES/CRSS define a large truck as a truck with a gross vehicle weight rating (GVWR) greater than 10,000 pounds. The Motor Carrier Management Information System (MCMIS) defines a large truck as a vehicle designed, used, or maintained primarily for carrying property, with a GVWR or gross combination weight rating (GCWR) of more than 10,000 pounds, or any vehicle carrying hazardous materials that requires placarding, regardless of weight.

Buses: A bus is defined as a vehicle with seats for at least nine people, including the driver.

4-1 Total Crashes by Vehicle Type, 2016-2019

	Number of Crashes Involving:			
Year	Large Trucks	Buses	Large Trucks and Buses	All Vehicle Types
2016	434,000	67,000	496,000	6,821,000
2017	450,000	66,000	512,000	6,454,000
2018	499,000	65,000	560,000	6,735,000
2019	510,000	72,000	580,000	6,755,000

Notes: Individual subtotals may not add to the totals due to the potential for double counting (e.g., crashes involving both a truck and a bus). A large truck is defined here as a truck with a GVWR greater than 10,000 pounds. A bus is defined as a vehicle with seats for at least nine people, including the driver. The "All Vehicle Types" category includes crashes involving passenger cars, light trucks, large trucks, buses, motorcycles, or any other type of motorized vehicle. These numbers include fatal crash data from FARS and injury crash and property-damage-only (PDO) crash data from CRSS. CRSS takes samples motor vehicle crashes—the results generated are estimates rounded to the nearest one thousand; however, associated percentages and rates are based on the unrounded data.
Data Sources: NHTSA, FARS, and CRSS.

4-2 Fatal Crashes by Vehicle Type, 2016-2019

	Number of Crashes Involving:			
Year	Large Trucks	Buses	Large Trucks and Buses	All Vehicle Types
2016	4,177	231	4,396	34,748
2017	4,367	231	4,587	34,560
2018	4,461	234	4,678	33,919
2019	4,479	231	4,696	33,244

Notes: Individual subtotals may not add to the totals due to the potential for double counting (e.g., crashes involving both a truck and a bus). A large truck is defined here as a truck with a GVWR greater than 10,000 pounds. A bus is defined as a vehicle with seats for at least nine people, including the driver. The "All Vehicle Types" category includes crashes involving passenger cars, light trucks, large trucks, buses, motorcycles, or any other type of motorized vehicle.
Data Source: NHTSA, FARS.

4-3 Injury Crashes by Vehicle Type, 2016-2019

	Number of Crashes Involving:			
Year	Large Trucks	Buses	Large Trucks and Buses	All Vehicle Types
2016	97,000	16,000	112,000	2,116,000
2017	102,000	15,000	116,000	1,889,000
2018	107,000	15,000	121,000	1,894,000
2019	114,000	13,000	127,000	1,916,000

Notes: Individual subtotals may not add to the totals due to the potential for double counting (e.g., crashes involving both a truck and a bus). A large truck is defined here as a truck with a gross vehicle weight rating (GVWR) greater than 10,000 pounds. A bus is defined as a vehicle with seats for at least nine people, including the driver. The "All Vehicle Types" category includes crashes involving passenger cars, light trucks, large trucks, buses, motorcycles, or any other type of motorized vehicle. These numbers include injury crash data from CRSS. CRSS takes samples motor vehicle crashes—the results generated are estimates rounded to the nearest one thousand; however, associated percentages and rates are based on the unrounded data.
Data Sources: NHTSA, and CRSS.

4-4 Property-Damage-Only (PDO) Crashes by Vehicle Type, 2016-2019

	Number of Crashes Involving:			
Year	Large Trucks	Buses	Large Trucks and Buses	All Vehicle Types
2016	333,000	51,000	380,000	4,670,000
2017	344,000	51,000	391,000	4,530,000
2018	388,000	50,000	434,000	4,807,000
2019	392,000	59,000	448,000	4,806,000

Notes: Individual subtotals may not add to the totals due to the potential for double counting (e.g., crashes involving both a truck and a bus). A large truck is defined here as a truck with a gross vehicle weight rating (GVWR) greater than 10,000 pounds. A bus is defined as a vehicle with seats for at least nine people, including the driver. The "All Vehicle Types" category includes crashes involving passenger cars, light trucks, large trucks, buses, motorcycles, or any other type of motorized vehicle. These numbers include PDO crash data from CRSS. CRSS takes samples of motor vehicle crashes—the results generated are estimates rounded to the nearest one thousand; however, associated percentages and rates are based on the unrounded data.
Data Sources: NHTSA and CRSS.

4-5 Large Truck Fatal Crashes, 1975-2019

Year	Fatal Crashes Involving Large Trucks	Large Truck Occupant Fatalities	Total Fatalities in Large Truck Crashes	Million VMT by Large Trucks	Rates per 100 Million VMT: Fatal Crashes Involving Large Trucks	Rates per 100 Million VMT: Fatalities in Large Truck Crashes	Large Trucks Registered
1975	3,722	961	4,483	81,330	4.58	5.51	5,362,369
1980	5,042	1,262	5,971	108,491	4.65	5.50	5,790,653
1985	4,841	977	5,734	123,504	3.92	4.64	5,996,337
1990	4,518	705	5,272	146,242	3.09	3.60	6,195,876
1995	4,194	648	4,918	178,156	2.35	2.76	6,719,421
2000	4,573	754	5,282	205,520	2.23	2.57	8,022,649
2005	4,551	804	5,240	222,523	2.05	2.35	8,481,999
2010	3,271	530	3,686	286,527	1.14	1.29	10,770,054
2011	3,365	640	3,781	267,594	1.26	1.41	10,270,693
2012	3,486	697	3,944	269,207	1.29	1.47	10,659,380
2013	3,554	695	3,981	275,017	1.29	1.45	10,597,356
2014	3,429	656	3,908	279,132	1.23	1.40	10,905,956
2015	3,622	665	4,094	279,844	1.29	1.46	11,203,184
2016†	*4,177*	*815*	*4,678*	*287,895*	*1.45*	*1.62*	*11,498,561*
2017†	*4,367*	*878*	*4,906*	*297,593*	*1.47*	*1.65*	*12,229,216*
2018†	*4,461*	*890*	*5,006*	*304,864*	*1.46*	*1.64*	*13,233,910*
2019†	*4,479*	*892*	*5,005*	*300,050*	*1.49*	*1.67*	*13,085,643*

†Beginning with data for 2016, the National Highway Traffic Safety Administration (NHTSA) implemented changes to revise vehicle classification based on gross vehicle weight rating (GVWR), which reclassified 329 light pickup trucks as large trucks. Due to this methodology change, comparisons of the 2016 (and later) Fatality Analysis Reporting System (FARS) large truck data with prior years should be performed with caution.

Notes: A large truck is defined here as a truck with a GVWR greater than 10,000 pounds. The Federal Highway Administration (FHWA) implemented an enhanced methodology for estimating registered vehicles and vehicle miles traveled (VMT) by vehicle type beginning with data from 2007. As a result, involvement rates may differ, and in some cases significantly, from earlier years.

4-6 Large Truck Injury Crashes, 2016-2019

Year	Injury Crashes Involving Large Trucks	Large Trucks Involved in Injury Crashes	Persons Injured in Large Truck Crashes	Million VMT by Large Trucks	Rates per 100 Million VMT: Injury Crashes Involving Large Trucks	Rates per 100 Million VMT: Persons Injured in Large Truck Crashes	Large Trucks Registered
2016	97,000	102,000	134,000	287,895	33.7	46.7	11,498,561
2017	102,000	107,000	148,000	297,593	34.4	49.7	12,229,216
2018	107,000	112,000	151,000	304,864	35.0	49.4	13,233,910
2019	114,000	119,000	158,000	300,050	38.0	52.8	13,085,643

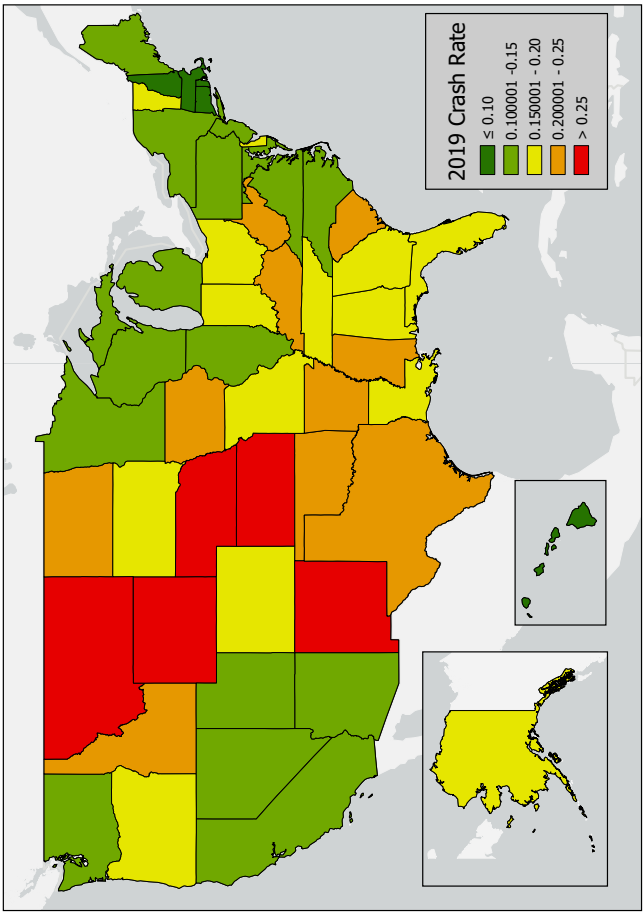
Notes: "Persons Injured" includes all nonfatally injured persons in injury and fatal crashes. A large truck is defined here as a truck with a gross vehicle weight rating (GVWR) greater than 10,000 pounds.
The rates displayed in this table are based on unrounded CRSS data. CRSS takes samples of motor vehicle crashes—the results generated are estimates rounded to the nearest one thousand; however, associated percentages and rates are based on the unrounded data.
Data Sources: Vehicle Miles Traveled and Registered Vehicles: FHWA, *Highway Statistics 2019*. Injury Crashes, Vehicles Involved, and Persons Injured: NHTSA and CRSS.

4-7 Large Truck and Bus Fatality Rates Per 100 Million Total Vehicle Miles Traveled (VMT) by State, 2018 and 2019

State	2018			2019		
	Fatalities	Million VMT	Fatality Rate	Fatalities	Million VMT	Fatality Rate
Alabama	126	71,167	0.18	141	71,735	0.20
Alaska	10	5,487	0.18	9	5,881	0.15
Arizona	100	66,145	0.15	92	70,281	0.13
Arkansas	89	36,675	0.24	82	37,099	0.22
California	399	348,796	0.11	429	340,836	0.13
Colorado	97	53,954	0.18	106	54,634	0.19
Connecticut	31	31,596	0.10	23	31,601	0.07
Delaware	19	10,179	0.19	17	10,245	0.17
D.C.	6	3,691	0.16	0	3,756	0.00
Florida	339	221,816	0.15	368	226,514	0.16
Georgia	203	131,456	0.15	217	133,128	0.16
Hawaii	8	10,887	0.07	4	11,024	0.04
Idaho	56	17,709	0.32	44	18,058	0.24
Illinois	174	107,954	0.16	148	107,525	0.14
Indiana	155	81,529	0.19	146	82,719	0.18
Iowa	64	33,282	0.19	70	33,537	0.21
Kansas	87	32,190	0.27	86	31,843	0.27
Kentucky	109	49,544	0.22	119	49,410	0.24
Louisiana	110	50,045	0.22	93	51,360	0.18
Maine	18	14,784	0.12	18	14,871	0.12
Maryland	76	59,775	0.13	69	60,216	0.11
Massachusetts	38	66,772	0.06	34	64,890	0.05
Michigan	113	102,398	0.11	111	102,174	0.11
Minnesota	48	60,438	0.08	62	60,731	0.10
Mississippi	113	40,730	0.28	93	41,091	0.23
Missouri	138	76,595	0.18	140	79,168	0.18
Montana	17	12,700	0.13	35	12,892	0.27
Nebraska	52	20,975	0.25	66	21,242	0.31
Nevada	27	28,319	0.10	43	28,794	0.15
New Hampshire	24	13,776	0.17	7	13,828	0.05
New Jersey	99	77,539	0.13	89	78,205	0.11
New Mexico	68	27,288	0.25	78	27,772	0.28
New York	111	123,510	0.09	136	123,986	0.11
North Carolina	184	121,127	0.15	165	122,475	0.13
North Dakota	31	9,856	0.31	21	9,826	0.21
Ohio	188	114,474	0.16	179	114,694	0.16
Oklahoma	119	45,433	0.26	105	44,648	0.24
Oregon	74	36,848	0.20	68	35,808	0.19
Pennsylvania	157	102,109	0.15	142	102,864	0.14
Rhode Island	3	8,009	0.04	4	7,581	0.05
South Carolina	124	56,801	0.22	126	57,939	0.22
South Dakota	29	9,719	0.30	16	9,922	0.16
Tennessee	132	81,321	0.16	156	82,892	0.19
Texas	677	282,037	0.24	671	288,227	0.23
Utah	41	32,069	0.13	47	32,911	0.14
Vermont	12	7,346	0.16	12	7,346	0.16
Virginia	116	85,336	0.14	115	85,432	0.13
Washington	66	62,367	0.11	84	62,530	0.13
West Virginia	54	19,447	0.28	43	19,077	0.23
Wisconsin	78	65,885	0.12	74	66,348	0.11
Wyoming	32	10,438	0.31	41	10,208	0.40
National Totals	**5,241**	**3,240,327**	**0.16**	**5,244**	**3,261,772**	**0.16**

Notes: D.C. = District of Columbia. Fatality rate is equal to "Fatalities" divided by "Million VMT," multiplied by 100. A large truck is defined here as a truck with a gross vehicle weight rating (GVWR) greater than 10,000 pounds. A bus is defined as a vehicle with seats for at least nine people, including the driver.
Data Sources: VMT - Federal Highway Administration (FHWA), *Highway Statistics 2019*; Fatalities - National Highway Traffic Safety Administration (NHTSA), Fatality Analysis Reporting System (FARS).

4-8 Large Truck and Bus Fatality Rates Per 100 Million Total Vehicle Miles Traveled (VMT) by State, 2019



Data Sources: Vehicle Miles Traveled - FHWA, *Highway Statistics 2019*; Fatalities - National Highway Traffic Safety Administration (NHTSA), Fatality Analysis Reporting System (FARS).

4-9 Vehicle Occupants Killed in Large Truck Crashes by Vehicle Type, 2016-2019

Occupant of:	2016	2017	2018	2019
Passenger Car	1,629	1,741	1,696	1,645
Light Truck	1,364	1,469	1,536	1,570
Large Truck	815	878	890	892
Motorcycle	302	285	288	299
Bus	18	17	25	4
Other/Unknown	38	23	18	26
Total Vehicle Occupants	**4,166**	**4,413**	**4,453**	**4,436**

Notes: A passenger car is defined here as a motor vehicle used primarily for carrying passengers, including convertibles, sedans, and station wagons. A light truck is defined as a truck with a GVWR of 10,000 pounds or less, including pickups, vans, truck-based station wagons, and sport utility vehicles. A large truck is defined as a truck with a GVWR greater than 10,000 pounds. A bus is defined as a vehicle with seats for at least nine people, including the driver.
Data Source: NHTSA, FARS.

4-10 Nonmotorists Killed in Large Truck Crashes, 2016-2019

Nonmotorist Type	2016	2017	2018	2019
Total Nonmotorist Fatalities	511	493	553	569
Pedestrian	397	391	452	454
Pedalcyclist	97	78	78	88
Other/Unknown Nonmotorist	17	24	23	27
Total Fatalities	**4,678**	**4,906**	**5,006**	**5,005**
Percent Nonmotorist Fatalities	**10.9%**	**10.0%**	**11.0%**	**11.4%**

Notes: A large truck is defined here as a truck with a GVWR greater than 10,000 pounds. A nonmotorist is defined as any person who is not an occupant of a motor vehicle, including, but not limited to, the following: pedestrians, pedalcyclists, or others such as skateboard riders, people riding on animals, and persons riding in other nonmotorized conveyances.
Data Source: NHTSA, FARS.

4-11 Nonmotorists Killed in Bus Crashes, 2016-2019

Nonmotorist Type	2016	2017	2018	2019
Total Nonmotorist Fatalities	68	54	64	73
Pedestrian	53	42	54	58
Pedalcyclist	12	11	7	12
Other/Unknown Nonmotorist	3	1	3	3
Total Fatalities	**290**	**276**	**267**	**258**
Percent Nonmotorist Fatalities	**23.4%**	**19.6%**	**24.0%**	**28.3%**

Notes: A bus is defined here as a vehicle with seats for at least nine people, including the driver. A nonmotorist is defined as any person who is not an occupant of a motor vehicle, including, but not limited to, the following: pedestrians, pedalcyclists, skateboard riders, people riding on animals, and persons riding in other nonmotorized conveyances.
Data Source: National Highway Traffic Safety Administration, Fatality Analysis Reporting System.

4-12 Fatal Crashes by Work Zone, 2016-2019

	2016		2017		2018		2019	
Crash Type:	**No.**	**Pct.**	**No.**	**Pct.**	**No.**	**Pct.**	**No.**	**Pct.**
Large Truck Fatal Crashes	4,177	100.0%	4,367	100.0%	4,461	100.0%	4,479	100.0%
Work Zone	194	4.6%	221	5.1%	207	4.6%	248	5.5%
Not a Work Zone	3,983	95.4%	4,146	94.9%	4,254	95.4%	4,231	94.5%
All Fatal Crashes	34,748	100.0%	34,560	100.0%	33,919	100.0%	33,244	100.0%
Work Zone	687	2.0%	720	2.1%	672	2.0%	762	2.3%
Not a Work Zone	34,061	98.0%	33,840	97.9%	33,247	98.0%	32,482	97.7%
Percent of Work-Zone Fatal Crashes that Involved at Least One Large Truck	**28.2%**		**30.7%**		**30.3%**		**32.5%**	
Percent of All Fatal Crashes that Involved at Least One Large Truck	**12.0%**		**12.6%**		**13.1%**		**13.5%**	

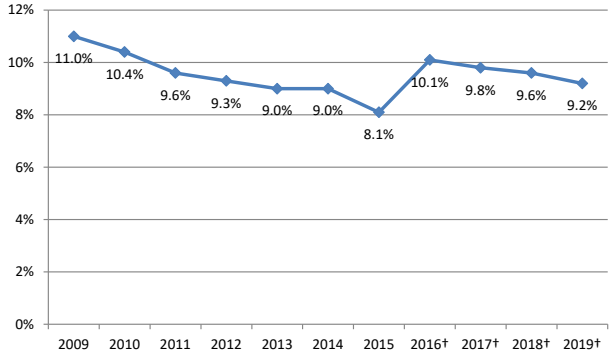
Notes: "Not a Work Zone" counts include crashes where the location was unknown. A large truck is defined here as a truck with a GVWR greater than 10,000 pounds. A work zone is defined as an area of a trafficway where construction, maintenance, or utility work activities are identified by warning signs/signals/indicators.
Data Source: NHTSA, FARS.

4-13 Truck Weight Rating for Large Trucks in Fatal Crashes, 2016-2019

Truck Weight Rating	2016	2017	2018	2019
Class 3: 10,001 - 14,000 lb	478	593	637	656
Class 4: 14,001 - 16,000 lb	116	102	115	131
Class 5: 16,001 - 19,500 lb	112	151	174	163
Class 6: 19,501 - 26,000 lb	249	246	287	275
Class 7: 26,001 - 33,000 lb	225	271	229	238
Class 8: > 33,000 lb	3,082	3,319	3,327	3,424
Unknown/Other	300	123	140	118
Total	**4,562**	**4,805**	**4,909**	**5,005**

Notes: A large truck is defined here as a truck with a GVWR greater than 10,000 pounds.
Data Source: NHTSA, FARS.

4-14 Percentage of Large Truck Drivers in Fatal Crashes Not Wearing Any Type of Safety Belt, 2009-2019



†Beginning with data for 2016, the National Highway Traffic Safety Administration (NHTSA) implemented changes to revise vehicle classification based on gross vehicle weight rating (GVWR), which reclassified 329 light pickup trucks as large trucks. Due to this methodology change, comparisons of the 2016 (and later) Fatality Analysis Reporting System (FARS) large truck data with prior years should be performed with caution.
Note: A large truck is defined here as a truck with a GVWR greater than 10,000 pounds.
Data Source: NHTSA, FARS.

4-15 Hazardous Materials (HM) Cargo Release in Crashes Involving Large Trucks with HM Placards, 2016-2020

	Number of Large Trucks				
Cargo Release	**2016**	**2017**	**2018**	**2019**	**2020***
Cargo Release: No	2,500	2,793	2,954	2,692	2,131
Cargo Release: Yes	553	605	664	625	556
Corrosives	41	41	50	36	41
Explosives	18	11	16	20	13
Flammable Liquid	295	284	345	287	290
Flammable Solids	6	7	7	9	6
Gases	65	66	57	76	69
Miscellaneous Dangerous Goods	37	51	61	58	35
Oxidizing Substances	5	2	12	2	7
Poison & Infectious Substances	4	8	7	2	6
Radioactive Material	0	3	0	1	1
Unknown	82	132	109	134	88
Cargo Release: Unknown	524	496	501	373	265
Total	**3,577**	**3,894**	**4,119**	**3,690**	**2,952**

*Crash records reported to the Motor Carrier Management Information System (MCMIS) through March 26, 2021, are included in this table. States are expected to report crash data to FMCSA within 90 days of the crash. Data are considered preliminary for 22 months to allow for changes.

Notes: Large trucks are defined here as vehicles designed, used, or maintained primarily for carrying property, with a gross vehicle weight rating (GVWR) or gross combination weight rating (GCWR) of more than 10,000 pounds or any vehicle carrying HM that requires placarding, regardless of weight.

Data Source: FMCSA, MCMIS, data snapshot as of March 26, 2021.

4-16 Large Truck and Bus Drivers in Crashes, by Driver's License Class, 2016-2020

	Number of Vehicles Involved				
License Class	**2016**	**2017**	**2018**	**2019**	**2020***
Class A	115,051	118,155	125,662	123,189	106,851
Class B	22,712	22,195	23,322	23,253	15,485
Class C	11,429	12,866	15,540	15,588	12,779
Class D	21,055	21,114	22,969	22,975	19,874
Class M	184	176	116	86	69
Unknown	7,662	8,251	8,996	9,295	9,191
Total	**178,093**	**182,757**	**196,605**	**194,386**	**164,249**

*Crash records reported to the Motor Carrier Management Information System (MCMIS) through March 26, 2021, are included in this table. States are expected to report crash data to FMCSA within 90 days of the crash. Data are considered preliminary for 22 months to allow for changes.

Notes: Large trucks are defined here as vehicles designed, used, or maintained primarily for carrying property, with a gross vehicle weight rating (GVWR) or gross combination weight rating (GCWR) of more than 10,000 pounds, or any vehicle carrying hazardous materials (HM) that requires placarding, regardless of weight. A bus is defined as a vehicle with seats for at least nine people, including the driver. Descriptions for driver's license classes are as follows: Class A pertains to any combination of vehicles which has a GCWR or gross combination weight of 26,001 pounds or more, whichever is greater, inclusive of a towed unit(s) with a GVWR or gross vehicle weight of more than 10,000 pounds, whichever is greater. Class B pertains to any single vehicle which has a GVWR or gross vehicle weight of 26,001 pounds or more, or any such vehicle towing a vehicle with a GVWR or gross vehicle weight that does not exceed 10,000 pounds. Class C pertains to any single vehicle, or combination of vehicles, that does not meet the definition of Class A or Class B, but is either designed to transport 16 or more passengers, including the driver, or is transporting material that has been designated as hazardous and is required to be placarded or is transporting any quantity of a material listed as a select agent or toxin. Class D pertains to any vehicle, or any combination of vehicles, with a GVWR of 26,000 pounds or less that is not used 1) for the purpose of transporting HM which are required by law to be placarded, 2) to transport more than 15 passengers including the driver, and 3) is not a school bus used to transport children to and from school for compensation. Class M pertains to motorcycles and motor-driven cycles.

Data Source: FMCSA, MCMIS, data snapshot as of March 26, 2021.

4-17 Large Trucks in Crashes by Operation Classification, 2016-2020

Operation Classification	2016	2017	2018	2019	2020*
For-Hire	88,716	94,163	100,900	93,535	87,511
Private	27,441	27,375	29,439	27,597	24,220
Both For-Hire and Private	13,114	14,185	15,341	15,051	13,690
Neither For-Hire Nor Private	1,694	1,615	1,497	1,418	1,287
No USDOT Number	28,899	26,042	29,205	28,288	27,690
Total	**159,864**	**163,380**	**176,382**	**165,889**	**154,398**

*Crash records reported to the Motor Carrier Management Information System (MCMIS) through March 26, 2021 are included in this table. States are expected to report crash data to FMCSA within 90 days of the crash. Data are considered preliminary for 22 months to allow for changes.
Note: Large trucks are defined here as vehicles designed, used, or maintained primarily for carrying property, with a gross vehicle weight rating (GVWR) or gross combination weight rating (GCWR) of more than 10,000 pounds, or any vehicle carrying hazardous materials (HM) that requires placarding, regardless of weight.
Data Sources: Crash data for all years: FMCSA, MCMIS, data snapshot as of March 26, 2021. Operation classification information: FMCSA, MCMIS, data snapshots as of December 30, 2016; December 29, 2017; December 28, 2018; December 27, 2019; and December 18, 2020.

4-18 Large Trucks in Crashes by Carrier Operation, 2016-2020

Carrier Operation	2016	2017	2018	2019	2020*
Interstate	111,478	115,725	123,385	114,682	105,710
Intrastate Hazardous Materials (HM)	1,499	1,731	1,858	1,918	1,724
Intrastate Non-HM**	17,977	19,865	21,666	20,645	19,150
Unknown Carrier Operation**	11	17	1,334	1,313	944
No USDOT Number	28,899	26,042	28,139	27,331	26,870
Total	**159,864**	**163,380**	**176,382**	**165,889**	**154,398**

*Crash records reported to the Motor Carrier Management Information System (MCMIS) through March 26, 2021 are included in this table. States are expected to report crash data to FMCSA within 90 days of the crash. Data are considered preliminary for 22 months to allow for changes.
**Some States do not require intrastate non-HM carriers to obtain USDOT numbers.
Note: Large trucks are defined here as vehicles designed, used, or maintained primarily for carrying property, with a gross vehicle weight rating (GVWR) or gross combination weight rating (GCWR) of more than 10,000 pounds, or any vehicle carrying HM that requires placarding, regardless of weight.
Data Sources: Crash data for all years: FMCSA, MCMIS, data snapshot as of March 26, 2021. Operation classification information: FMCSA, MCMIS, data snapshots as of December 30, 2016; December 29, 2017; December 28, 2018; December 27, 2019; and December 18, 2020.

4-19 Bus Fatal Crashes, 1975-2019

Year	Fatal Crashes Involving Buses	Bus Occupant Fatalities	Total Fatalities in Bus Crashes	Million VMT by Buses	Rates per 100 Million VMT: Fatal Crashes Involving Buses	Rates per 100 Million VMT: Fatalities in Bus Crashes	Buses Registered
1975	323	53	348	6,055	5.33	5.75	462,156
1980	329	46	390	6,059	5.43	6.44	528,789
1985	337	57	398	4,478	7.53	8.89	593,485
1990	286	32	340	5,726	4.99	5.94	626,987
1995	271	33	311	6,420	4.22	4.84	685,503
2000	323	22	357	7,590	4.26	4.70	746,125
2005	278	58	340	6,980	3.98	4.87	807,053
2010	247	44	278	13,770	1.79	2.02	846,051
2011	243	55	284	13,807	1.76	2.06	666,064
2012	252	39	282	14,781	1.70	1.91	764,509
2013	282	54	320	15,167	1.86	2.11	864,549
2014	235	44	283	15,999	1.47	1.77	872,027
2015	259	49	297	16,230	1.60	1.83	888,907
2016	231	64	290	16,350	1.41	1.77	976,161
2017	231	43	276	17,227	1.34	1.60	983,231
2018	234	44	267	18,303	1.28	1.46	992,152
2019	231	35	258	17,980	1.28	1.43	995,033

Note: A bus is defined as a vehicle with seats for at least nine people, including the driver.
Data Sources: Vehicle Miles Traveled and Registered Vehicles - FHWA, *Highway Statistics 2019*; Fatal Crashes, Vehicles Involved, and Fatalities - National Highway Traffic Safety Administration (NHTSA), Fatality Analysis Reporting System (FARS).

4-20 Bus Injury Crashes, 2016-2019

Year	Injury Crashes Involving Buses	Buses Involved in Injury Crashes	Persons Injured in Bus Crashes	Million VMT by Buses	Rates per 100 Million VMT: Injury Crashes Involving Buses	Rates per 100 Million VMT: Persons Injured in Bus Crashes	Buses Registered
2016	16,000	17,000	35,000	16,350	96.8	213.5	976,161
2017	15,000	15,000	25,000	17,227	84.6	142.5	983,231
2018	15,000	15,000	27,000	18,303	80.9	145.4	992,152
2019	13,000	14,000	25,000	17,980	74.6	140.4	995,033

Notes: "Persons Injured" includes all nonfatally injured persons in injury and fatal crashes. A bus is defined here as a vehicle with seats for at least nine people, including the driver. The rates displayed in this table are based on unrounded CRSS data. CRSS takes samples of motor vehicle crashes—the results generated are estimates rounded to the nearest one thousand; however, associated percentages and rates are based on the unrounded data.
Data Sources: Vehicle Miles Traveled and Registered Vehicles: FHWA, *Highway Statistics 2019*. Injury Crashes, Vehicles Involved, and Persons Injured: NHTSA, and CRSS.

4-21 Fatal Crashes Involving Buses, by Type of Bus, 1975-2019

Year	School Bus	Cross-Country Intercity Bus (Motorcoach)	Transit Bus	Van-Based Bus*	Other Bus Type	Bus Type Unknown	Total
1975	129	29	128	—	18	19	323
1980	117	38	149	—	14	11	329
1985	126	29	116	—	33	33	337
1990	111	26	113	—	19	17	286
1995	109	23	101	—	23	15	271
2000	119	40	127	—	20	17	323
2005	110	37	83	—	34	14	278
2010	113	35	84	—	11	4	247
2011	97	40	68	25	10	3	243
2012	101	34	78	30	7	2	252
2013	114	44	82	28	10	4	282
2014	90	32	79	9	21	4	235
2015	99	34	92	14	18	5	259
2016	87	17	97	6	19	6	231
2017	72	13	97	31	16	4	231
2018	81	15	84	30	23	2	234
2019	84	15	78	32	22	1	231

* "Van-based bus" was listed as a bus type for the first time in 2011.
Note: A bus is defined here as a vehicle with seats for at least nine people, including the driver.
Data Source: National Highway Traffic Safety Administration (NHTSA), Fatality Analysis Reporting System (FARS).

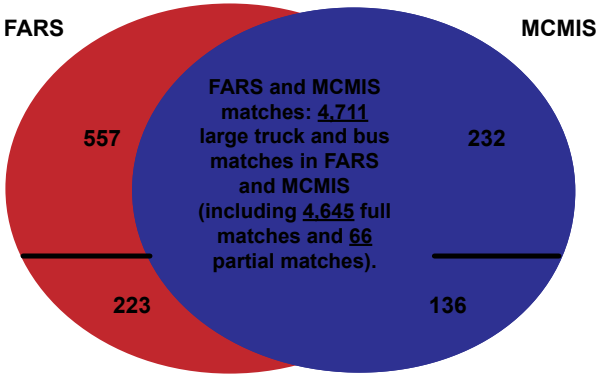
4-22 Estimated Costs of Large Truck and Bus Crashes, 2016-2019

Year	Fatal Crashes	Injury Crashes	Property-Damage-Only (PDO) Crashes	All Large Truck and Bus Crashes
2016	$57 Billion	$60 Billion	$29 Billion	$145 Billion
2017	$60 Billion	$62 Billion	$29 Billion	$151 Billion
2018	$61 Billion	$65 Billion	$33 Billion	$158 Billion
2019	$61 Billion	$68 Billion	$34 Billion	$163 Billion

Notes: A large truck is defined here as a truck with a GVWR greater than 10,000 pounds. A bus is defined as a vehicle with seats for at least nine people, including the driver. The total costs may not add up exactly due to rounding. Changes to past years are the result of updating for inflation and changes in guidance from the Office of the Secretary of Transportation on how to value fatalities and injuries. Estimates are based on fatal crash data from the Fatality Analysis Reporting System (FARS) and injury crash and PDO crash data from CRSS.
Data Sources: T. Miller, E. Zaloshnja, and R. Spicer, Revised Cost of Large Truck and Bus Involved Crashes (2002), adjusted to 2015 dollars, and a year 2015 value of a statistical life (VSL) (as published on August 8, 2016, by the Office of the Secretary of Transportation); NHTSA, FARS, and CRSS.

4-23 Fatality Analysis Reporting System (FARS) and Motor Carrier Management Information System (MCMIS) Matching for Large Trucks and Buses in Fatal Crashes, 2019

Number	Category	Percentage
4,645	Large trucks and buses matched in FARS and MCMIS	79.3%
66	Large trucks and buses that were partially matched in FARS and MCMIS	1.1%
557	Large trucks and buses in FARS and not in MCMIS	9.5%
223	Large trucks and buses in FARS matched to large trucks and buses in non-fatal crashes in MCMIS	3.8%
232	Large trucks and buses in MCMIS and not in FARS	4.0%
136	Large trucks and buses in MCMIS matched to vehicles in FARS that were not large trucks or buses	2.3%
5,859	**Total large trucks and buses in fatal crashes in FARS, MCMIS, or both**	**100.0%**



Notes: A large truck is defined in FARS as a truck with a GVWR greater than 10,000 pounds. A large truck is defined in MCMIS as a vehicle designed, used, or maintained primarily for carrying property, with a GVWR or gross combination weight rating (GCWR) of more than 10,000 pounds, or any vehicle carrying hazardous materials that requires placarding, regardless of weight. A bus is defined as a vehicle with seats for at least nine people, including the driver.
Data Sources: NHTSA, FARS, FMCSA, MCMIS, data snapshot as of January 31, 2020.

5. Data Quality

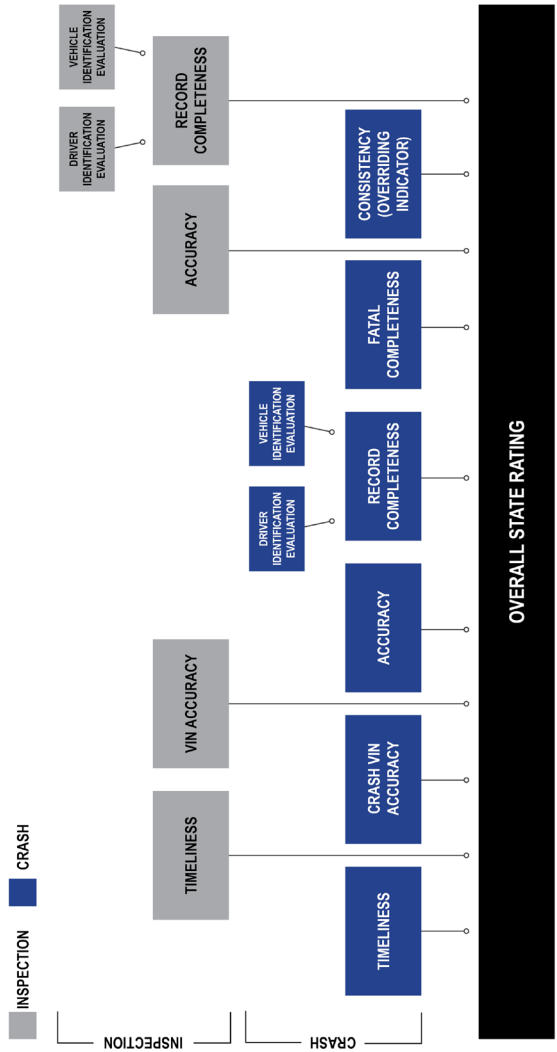
State Safety Data Quality (SSDQ) Methodology

FMCSA implemented the State Safety Data Quality (SSDQ) Methodology to evaluate the completeness, timeliness, accuracy, and consistency of State-reported data. The SSDQ evaluation uses a 12-month timeframe that ends 3 months prior to the Motor Carrier Management Information System (MCMIS) snapshot for each measure, unless otherwise stated in the rating description. The methodology consists of nine performance measures (five crash and four inspection measures) and one overriding performance indicator (see 5-1). The SSDQ methodology has changed over the years to represent higher thresholds of data quality. Since 2004, additional performance measures have been added related to the completeness of driver and vehicle information contained in crash and inspection reports.

The SSDQ evaluation is updated monthly to reflect improvements in crash and inspection reporting. States receive an overall rating of "Good," "Fair," or "Poor" for each SSDQ measure and rating. FMCSA developed the color-coded SSDQ map (see 5-2) as a visual tool for States to use in improving crash and inspection data reported to FMCSA. The overall data quality rating for each State is based on the following criteria:

- Good (green) for States with at least one good crash measure, one good inspection measure, and no poor measures.
- Fair (yellow) for States with no more than one poor measure.
- Poor (red) for States with two or more poor measures. States flagged red in Consistency (the overriding performance indictor shown in 5-1) are rated poor overall.

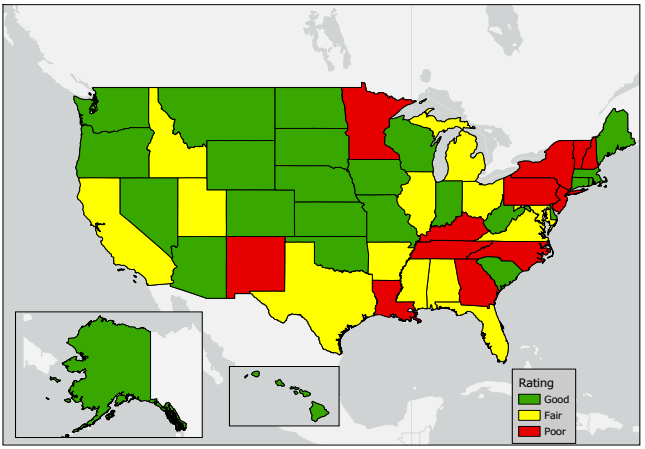
5-1 State Safety Data Quality (SSDQ) Performance Measures



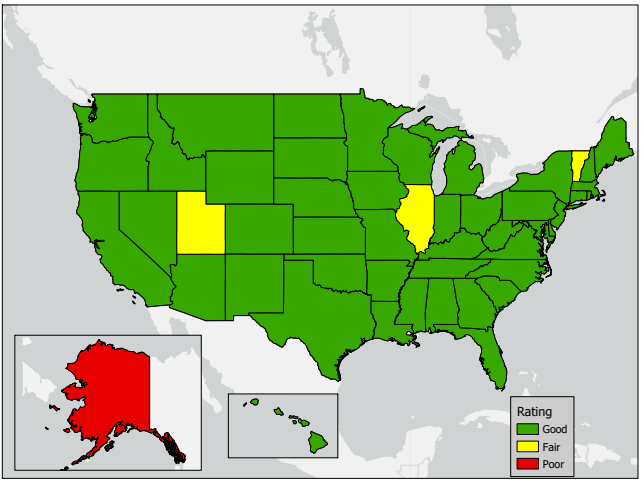
Data Source: FMCSA, Analysis & Information (A&I) Online, http://ai.fmcsa.dot.gov/DataQuality.

5-2 Overall State Safety Data Quality (SSDQ) Ratings, June 2004 and December 2020

Overall SSDQ Ratings, June 2004

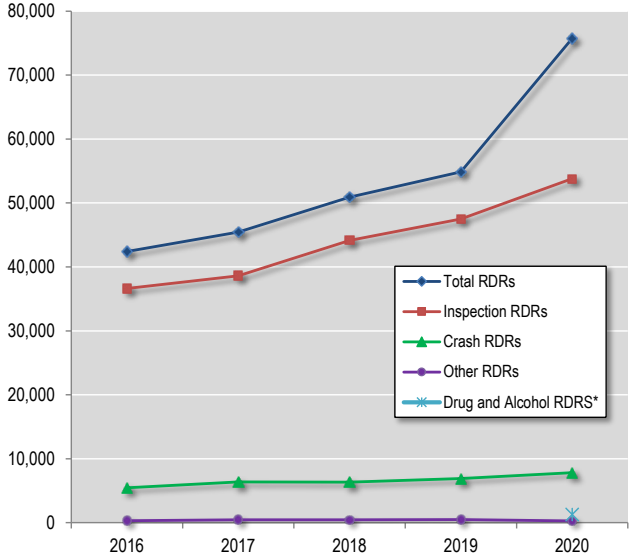


Overall SSDQ Ratings, December 2020



Note: Ratings depicted on this map are overall State ratings. Washington, D.C. is rated poor (red) in June 2004 and good (green) in December 2020.
Data Sources: June 2004 Ratings: FMCSA, Analysis & Information (A&I) Online, State Safety Data Quality (SSDQ) as of June 2004; December 2019 Ratings: FMCSA, A&I Online, SSDQ as of December 2020. For most recent State ratings, refer to: https://ai.fmcsa.dot.gov/DataQuality/National.aspx.

5-3 Annual Requests for Data Review (RDRs) in DataQs, 2016-2020



* The Drug & Alcohol Clearinghouse and Crash Preventability Determination Program began reviewing RDRs in 2020.
Data Source: FMCSA, DataQs, May 13, 2021 (based on submissions received in 2020).

DataQs is an online system that provides affected commercial motor carriers, commercial drivers, and others an opportunity to seek and obtain correction of information maintained and disseminated by FMCSA. Through the system, users can request and track a review of data issued by FMCSA; the system automatically forwards a Request for Data Review (RDR) to the appropriate office for resolution and collects updates and responses for current RDRs.

For more information on DataQs, please refer to: https://dataqs.fmcsa.dot.gov.

6. Grant Programs

FMCSA achieves its goal of preventing commercial motor vehicle (CMV)-related fatalities and injuries by working closely with a host of important safety partners through its grant programs. Safety partners include State and local government agencies, non-profit organizations, universities and other organizations who support FMCSA's national safety priorities. Activities conducted through FMCSA's grant programs include conducting high-visibility traffic enforcement in CMV crash corridors, targeting high-risk motor carriers and CMV drivers for compliance investigations, implementing innovative safety information systems and CMV technologies at the roadside, strengthening CMV equipment and operating standards, implementing and updating CMV safety training, and increasing public awareness of CMV safety challenges.

In December 2015, the Fixing America's Surface Transportation Act, or FAST Act, Public Law 114-94, directed the consolidation of multiple FMCSA grant programs into the Motor Carrier Safety Assistance Program (MCSAP) and High Priority (HP) grant programs. Beginning October 1, 2016 (or with Fiscal Year 2017), MCSAP and HP now include components of the previously separate New Entrant, Border Enforcement, State Safety Data Quality (SSDQ) (formerly known as the Safety Data Improvement Program, or SaDIP), Performance and Registration Information Systems Management (PRISM), and the Innovative Technology Deployment (ITD) (formerly known as Commercial Vehicle Information Systems and Networks, or CVISN) grant programs. The FAST Act also increased focus on accountability, performance standards, efficiency, and effectiveness while reducing administrative burdens on FMCSA grantees. More information on FMCSA's grant programs can be found at http://www.fmcsa.dot.gov/mission/grants.

6-1 FMCSA Grant Awards, Fiscal Year 2019

Grant Program	Total Awards
MCSAP	$299,735,500
High Priority	$43,340,000
CDL Program Implementation	$32,012,500
CMVOST	$2,000,000
Total Grant Awards	**$377,088,000**

Motor Carrier Safety Assistance Program (MCSAP)

Governed by 49 U.S.C. Sections 31102–31104 and by 49 CFR Part 350, the MCSAP grant is a formula grant program that provides financial assistance to the States, the District of Columbia, the Commonwealth of Puerto Rico, the Commonwealth of the Northern Mariana Islands, American Samoa, Guam, and the U.S. Virgin Islands to reduce the number and severity of crashes and hazardous material incidents involving CMVs. Specifically, only the State lead agency (as designated by the Governor) is eligible to apply for MCSAP grant funding. There are five national program elements for the MCSAP, outlined in 49 CFR 350.109. These include driver/vehicle inspections, traffic enforcement, compliance reviews (Compliance, Safety, Accountability investigations), public education and awareness, and data collection. FMCSA establishes annual national priorities based on emerging or continuing issues.

Per the FAST Act grant consolidation, MCSAP-eligible program activities now include Border Enforcement, New Entrant Safety Audits, SSDQ, PRISM, and ITD operations and maintenance. The Border Enforcement component provides financial assistance to States and entities that share a land border with another country. Border Enforcement activities focus on the compliance of CMVs entering the United States with the Federal Motor Carrier Safety Regulations and Hazardous Materials Regulations, as well as U.S. financial responsibility and registration requirements. All drivers of those vehicles must be properly licensed and qualified to operate a CMV in the United States.

High Priority (HP) Grant

HP grant funding is available for activities and projects that are national in scope, increase public awareness and education, demonstrate new technologies, and augment efforts to reduce the number and rate of CMV crashes. Eligible recipients are States, local governments, Federally-recognized Indian tribes, and other political jurisdictions as necessary. FMCSA may reserve HP funding for innovative traffic enforcement projects, with particular emphasis on work zone enforcement and rural road safety.

State Safety Data Quality (SSDQ)

SSDQ activities included within the HP grant program focus on providing financial and technical assistance to the States to facilitate the collection of accurate, complete, and timely data on all large commercial truck and bus crashes that involve a fatality, injury, or a vehicle towed from the crash scene. Reports from the Government Accountability Office and the USDOT Inspector General have previously recommended that improvements be made in FMCSA crash and enforcement data. Congress has responded by providing funding annually under HP for States to improve their reporting of large commercial truck and bus crash data.

Performance and Registration Information Systems Management (PRISM)

PRISM activities included within the HP grant program are focused on a cooperative Federal-State safety program developed to reduce commercial vehicle crashes. The performance of unsafe carriers is improved through a comprehensive system of identification, education, data gathering, safety monitoring, and enforcement. The PRISM program incorporates registration and enforcement processes to identify motor carriers and hold them responsible for the safety of their operations. To be eligible, State agencies located in one of the 50 States or a U.S. territory must work on highway traffic safety activities and demonstrate a capacity to work with highway traffic safety stakeholders.

Innovative Technology Deployment (ITD)

The ITD activities included within HP are a key component of FMCSA's drive to improve CMV safety through technology and information connectivity. The ITD grant program eligibility requirements differ from traditional HP grants, providing discretionary funding to the States, the District of Columbia, the Commonwealth of Puerto Rico, the Commonwealth of the Northern Mariana Islands, American Samoa, Guam, and the U.S. Virgin Islands to deploy, operate, and maintain elements of their ITD programs. FMCSA may award ITD funds to prospective recipients that have an approved plan, as outlined in the FAST Act.

The goals of the ITD Program are to:

- Improve the safety and productivity of motor carriers, commercial vehicles, and CMV drivers.
- Simplify enforcement operations.
- Improve the efficiency and effectiveness of commercial vehicle safety programs through targeted enforcement.
- Improve data security and commercial vehicle data sharing within the States and between the States and FMCSA.
- Reduce Federal/State and industry regulatory and administrative costs.
- Achieve nationwide deployment of the program, with all jurisdictions participating.

Commercial Driver's License Program Implementation (CDLPI) Grant

The CDLPI grant provides financial assistance to the States, to help them achieve compliance with the requirements of 49 CFR Parts 383 and 384. The grant also provides funding to other entities capable of executing national projects that aid States in their compliance efforts and that will improve the national Commercial Driver's License (CDL) program. The goal of the program is to reduce the number and severity of CMV crashes in the United States by ensuring that only qualified drivers receive and retain a CDL. This is achieved by focusing on the concept that for every driver, there is only one driving record and only one licensing document, commonly referred to as "One Driver–One License–One Record." States are required to conduct knowledge and skills testing before issuing a CDL, to maintain a complete and accurate driver history record for anyone who obtains a CDL, and to impose appropriate disqualifications against any driver who commits certain offenses. The Federal share of CDLPI grants in FY 2019 was 90 percent of the expenditures approved in the State or entity's application.

Commercial Motor Vehicle Operator Safety Training (CMVOST) Grant

The CMVOST Grant Program is a discretionary program that provides financial assistance to public or private organizations that train operators of CMVs, as defined by 49 U.S.C. 31103 and 31104 (i.e., accredited post-secondary educational institutions such as colleges, universities, vocational-technical schools, associations, and truck driver training schools). The goals of the CMVOST grant program are to expand the number of CDL holders who possess enhanced operator safety training to help reduce the severity and number of crashes involving CMVs on U.S. roads, and to assist current or former members of the U.S. Armed Forces (including National Guard members and Reservists) and their spouses who are transitioning to the CMV operation industry by offering training.

7. Agency Resources

FMCSA Web site
http://www.fmcsa.dot.gov

Analysis & Information (A&I) Online
http://ai.fmcsa.dot.gov

Compliance, Safety, Accountability (CSA)
https://csa.fmcsa.dot.gov

DataQs
http://dataqs.fmcsa.dot.gov

FMCSA Grants and Financial Assistance
https://www.fmcsa.dot.gov/mission/grants

FMCSA New Entrant Safety Assurance Program
https://www.fmcsa.dot.gov/safety/new-entrant-safety-assurance-program

FMCSA Portal
https://portal.fmcsa.dot.gov

Freight Analysis Framework (FAF)
http://ops.fhwa.dot.gov/FREIGHT/freight_analysis/faf/index.htm

Innovative Technology Deployment (ITD) Program
https://www.fmcsa.dot.gov/information-systems/itd/innovative-technology-deployment-itd

Motor Carrier Management Information System (MCMIS)
https://ask.fmcsa.dot.gov/app/mcmiscatalog/mcmishome

Fatality Analysis Reporting System (FARS)
http://www.nhtsa.gov/FARS

Federal Highway Administration (FHWA) Highway Statistics Series
https://www.fhwa.dot.gov/policyinformation/statistics.cfm

General Estimates System (GES)
https://www.nhtsa.gov/national-automotive-sampling-system-nass/nass-general-estimates-system

Crash Report Sampling System (CRSS)
https://www.nhtsa.gov/national-center-statistics-and-analysis-ncsa/crash-report-sampling-system-crss#crash-report-sampling-system-crss-data-files

Licensing & Insurance (L&I)
http://li-public.fmcsa.dot.gov

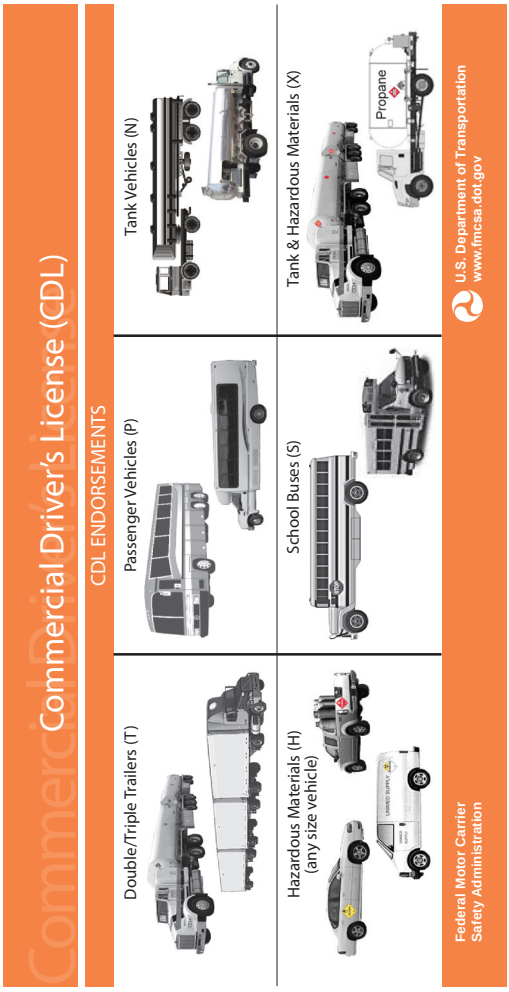
Glossary and List of Acronyms

A&I	Analysis & Information
ABS	Antilock Braking System
BTS	Bureau of Transportation Statistics
CDL	Commercial Driver's License
CDLPI	Commercial Driver's License Program Improvement
CMV	Commercial Motor Vehicle (includes both large trucks and buses)
CMVOST	Commercial Motor Vehicle Operator Safety Training
CRSS	Crash Report Sampling System
CSA	Compliance, Safety, Accountability (CSA) is a major FMCSA safety measurement and reporting initiative. Designed to replace the SafeStat program, CSA was previously known as "Comprehensive Safety Analysis," or more commonly "CSA 2010."
CVISN	Commercial Vehicle Information Systems and Networks
DataQs	DataQs is an FMCSA system that allows users to request and track reviews of Federal and State data issued by FMCSA. The system automatically forwards a user's Request for Data Review to the appropriate office for resolution and collects updates and responses for current requests.
Domicile	Refers to the headquarters location of a carrier.
EMIS	Enforcement Management Information System
FAF	Freight Analysis Framework
FARS	Fatality Analysis Reporting System
FAST Act	Fixing America's Surface Transportation Act, 2015
FHWA	Federal Highway Administration
FMCSA	Federal Motor Carrier Safety Administration
FMCSRs	Federal Motor Carrier Safety Regulations
Form MCS-150	Motor Carrier Identification Report (Application for USDOT Number)
GES	General Estimates System
GCWR	Gross Combination Weight Rating
GVWR	Gross Vehicle Weight Rating
HM	Hazardous Materials
HMRs	Hazardous Materials Regulations

HMSP	Hazardous Materials Carrier with a Safety Permit
HOS	Hours of Service
ITD	Innovative Technology Deployment (formerly CVISN)
L&I	Licensing & Insurance
MCMIS	The Motor Carrier Management Information System (MCMIS) is an FMCSA system that contains crash, census, and inspection files created to monitor and develop safety standards for commercial motor vehicles operating in interstate commerce.
MCSAP	Motor Carrier Safety Assistance Program
MMUCC	Model Minimum Uniform Crash Criteria
NHTSA	National Highway Traffic Safety Administration
OOS	Out of Service
PDO	Property Damage Only
PRISM	Performance and Registration Information Systems Management
RDR	Request for Data Review
SaDIP	State Safety Data Improvement Program
SBUCMVD	Seat Belt Usage by Commercial Motor Vehicle Drivers
SMS	Safety Measurement System
SSDQ	State Safety Data Quality
TSI	Transportation Services Index
UCR	Unified Carrier Registration
URS	Unified Registration System
USDOT	U.S. Department of Transportation
VIN	Vehicle Identification Number
VMT	Vehicle Miles Traveled
VSL	Value of a Statistical Life

Visor Cards for Law Enforcement

The FMCSA State Safety Data Quality (SSDQ) Program created five quick-reference visor identification cards for use by law enforcement officers. The cards are laminated and may be placed in the law enforcement vehicle sun visor.



These cards are intended to assist officers in the process of determining FMCSA's selection criteria for completing the commercial motor vehicle (CMV) section of their State's crash report form. The pictured visor card aids officers in identifying commerical motor vehicle types, some of which require endorsements to operate. All five visor cards are available for download at: https://www.fmcsa.dot.gov/regulations/enforcement/visor-cards-law-enforcement.

Commercial Driver's License (CDL)

COMMERCIAL MOTOR VEHICLE GROUPS

Group A (Combination Vehicle)
Any combination of vehicles with a gross combination weight rating (GCWR) of 26,001 pounds or more, provided the gross vehicle weight rating (GVWR) of the vehicle(s) being towed is in excess of 10,000 pounds.

Group B (Heavy Straight Vehicle)
Any single vehicle with a GVWR of 26,001 pounds or more, or any such vehicle towing a vehicle not in excess of 10,000 pounds GVWR.

Group C (Small Vehicle)
Any single vehicle, or combination of vehicles, that meets neither the definition of Group A nor Group B, but is designed to transport 16 or more passengers including the driver, or is used in the transportation of materials found to be hazardous which require the motor vehicle to be placarded. This includes any quantity of chemical or biological material or agent posing a threat to national security, including toxins.

Revised 01/06

Cover photo by Elena Kuchko