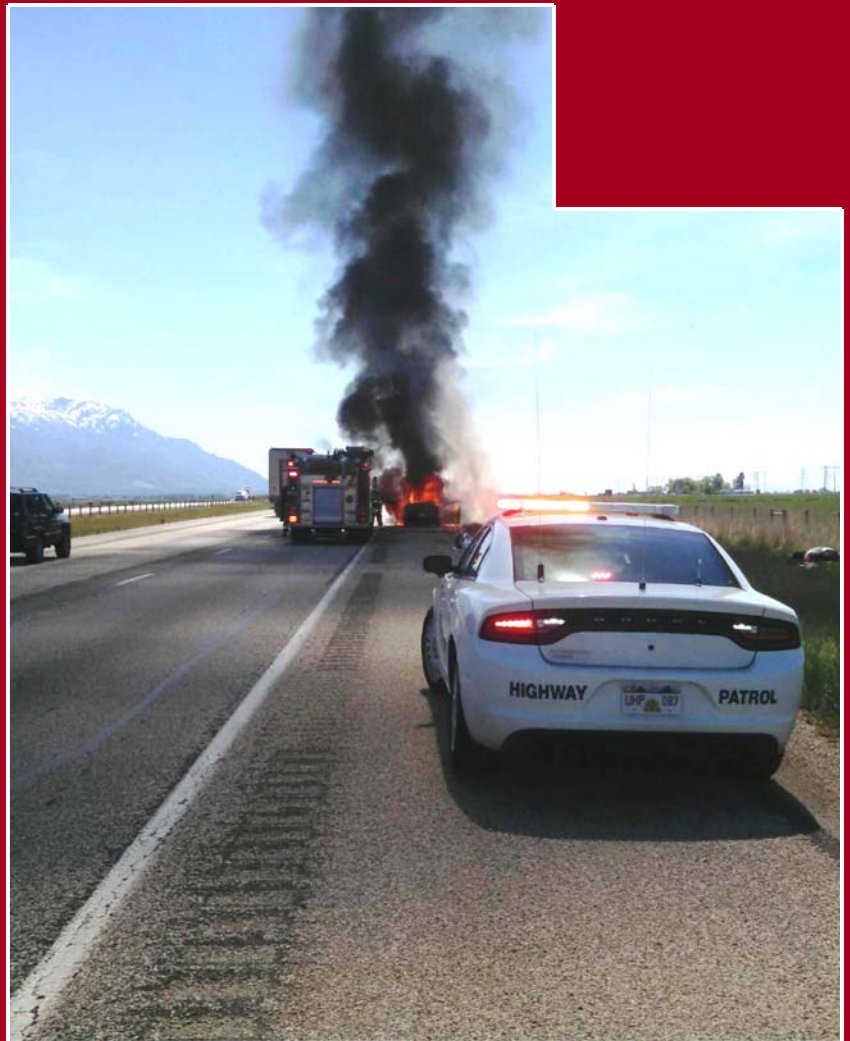
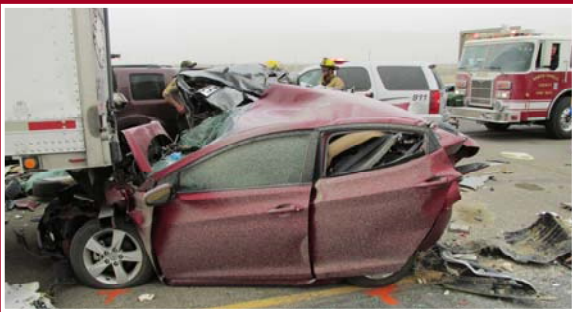


Utah Crash Summary 2016



State of Utah

Department of Public Safety

Utah Crash Summary 2016



Keith D. Squires, Commissioner
Utah Department of Public Safety

Kristy K. Rigby, Director
Highway Safety Office
Utah Department of Public Safety

Gary D. Mower, Traffic Records Program Manager
Highway Safety Office
Utah Department of Public Safety

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Introduction

Purpose: The annual Utah Crash Summary, as specified by Utah Code Section 41-6a-406, describes the trends and effects of traffic crashes in Utah. The statistics within the Utah Crash Summary describe factors that contribute to the occurrence of motor vehicle deaths, injuries, and crashes. This report is designed to heighten awareness about traffic safety issues and allows interested individuals to identify areas where safety programs may be focused in an effort to reduce traffic-related injuries and deaths.

Crash Data: Crash data comes from traffic crash reports completed by law enforcement officers throughout Utah who investigate crash scenes on public roadways. Information is collected when a crash involves an injury, death, or at least \$1,500 total property damage.

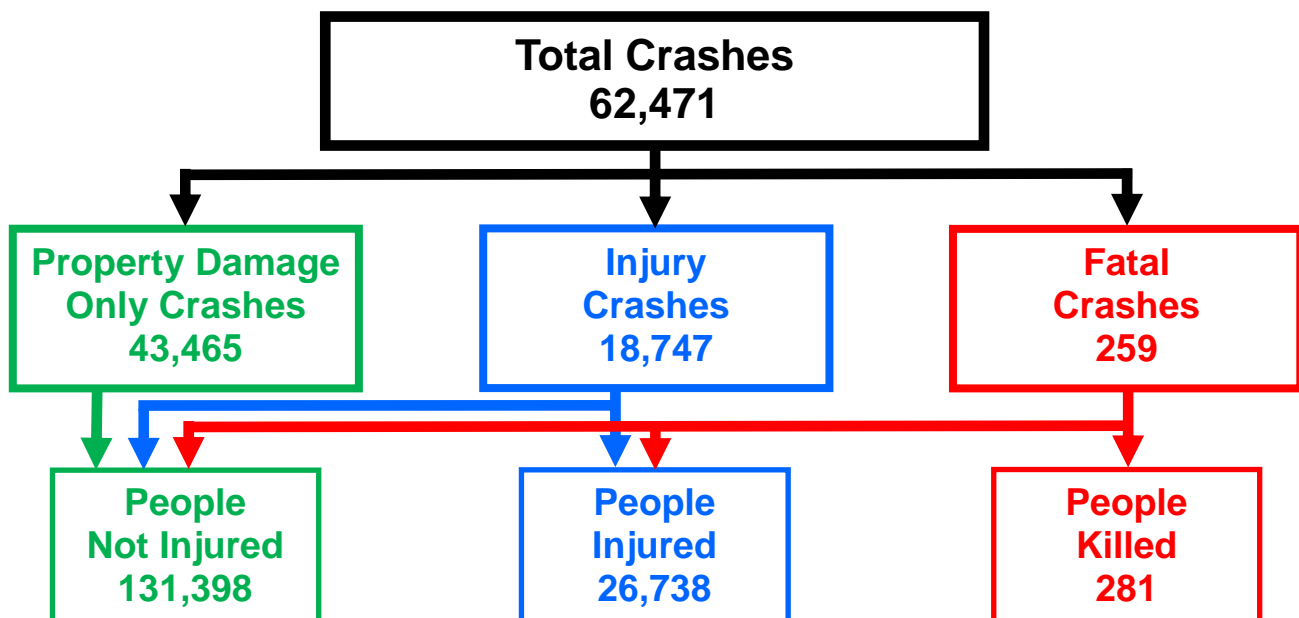
Fatal Crashes: Additional detailed information is collected on fatal crashes and compiled into the Fatality Analysis Reporting System (FARS). FARS is a national data system collecting data on all fatal traffic crashes in the U.S. FARS was used for the data on fatal crashes.

Fact Sheets: Each section of the crash summary is accompanied by a fact sheet. The fact sheets provide an overview of the section highlighting key points.

Prepared By: The Utah Department of Public Safety, Highway Safety Office prepared this report. For more information, please contact: Gary Mower, Traffic Records Program Manager • Utah Department of Public Safety, Highway Safety Office • 5500 W Amelia Earhart Dr, Suite 155 • Salt Lake City, Utah 84116 • (801) 366-6040 • gmower@utah.gov.

Available At: The Utah Crash Summary and fact sheets are available at the Utah Highway Safety Office website at highwaysafety.utah.gov.

2016 Utah Crash Flow Chart



Executive Summary

Significant progress has been made to reduce motor vehicle crashes in Utah, with a rapid decline in the injury and fatal crash rates over the last 40 years. If Utah had the same fatal crash rate in 2016 as 1976 there would have been 648 additional deaths in 2016. These reductions can be attributed to a variety of factors, including:

- Traffic safety programs that have increased public awareness of traffic safety issues;
- Aggressive media and enforcement programs targeting driver behavior;
- Legislation targeting restraint use, graduated driver licensing, and impaired driving;
- Improved safety of motor vehicles and engineering of roadways;
- Advancements in emergency response and treatment.

The personal and socioeconomic effect of motor vehicle crashes is a continuing concern in the State of Utah. In 2016, there were 62,471 reported traffic crashes on public roadways in Utah. These crashes involved 158,417 people, with 26,738 injured and 281 people killed.

Utah made progress in the following areas over the last few years:

- The Utah death rate per vehicle mile traveled has been below the U.S. rate since 2001;
- Restraint use continues to show an upward trend in crashes;
- Deaths involving a drunk driver decreased for the second straight year;
- The motorcyclist crash rate per registered motorcycle has shown a decreasing trend;
- The number of bicyclists in crashes in 2016 decreased for the fourth straight year.

As improvements are made and progress continues, traffic safety needs to remain a top priority. Some areas of concern in Utah include:

- Traffic crashes in Utah in 2016 were the highest ever;
- Traffic deaths were the highest total in Utah since 2007;
- The number of injured persons in crashes increased for the sixth straight year;
- There were 2,459 more traffic crashes in 2016 compared to 2015;
- Speed remains the leading contributing factor in deaths;
- The percent of crashes involving a teen driver increased for the third straight year after years of decreasing;
- Pedestrian crash rates per population have shown an increasing trend;
- Drowsy driving crashes were the highest since 2007, the second straight year this has happened;
- Deaths involving a distracted-driver has shown an increasing trend the last few years;
- The percent of crashes involving an older driver has shown an increasing trend;
- The number of crashes involving a drug-related driver in 2016 was the highest on record, the third straight year this has happened.

The *Utah Crash Summary 2016* contains further details regarding Utah motor vehicle crashes.

Users of this Crash Summary are invited to help promote motor vehicle safety in Utah. The numbers represent lost lives, injured people, and lives changed. Utah has set a goal of zero deaths because the loss of even one life is too many. This is a goal we can all live with.

2016 Utah Crash Synopsis

All Crashes						
Category	2016	% of 2016 Total*	2015	2016 % Change from 2015	3 Year Avg (2013-2015)	2016 % Change from 3 Year Avg
Total Persons in Crashes	158,417		151,237	4.7%	140,128	13.1%
Drivers	113,622	71.7%	108,312	4.9%	99,898	13.7%
Followed Too Closely Crash	45,615	28.8%	42,043	8.5%	37,278	22.4%
Passengers	43,134	27.2%	41,199	4.7%	38,505	12.0%
Teenage Driver Crash	37,531	23.7%	35,224	6.5%	32,036	17.2%
Failed to Yield Crash	34,569	21.8%	31,475	9.8%	29,190	18.4%
Speed Crash	28,283	17.9%	25,845	9.4%	24,277	16.5%
Injured Persons	26,738	16.9%	25,350	5.5%	23,818	12.3%
Inclement Weather Crash	26,631	16.8%	24,368	9.3%	24,876	7.1%
Older (Age 65+) Driver Crash	22,398	14.1%	21,362	4.8%	19,786	13.2%
Distracted Driving Crash	16,066	10.1%	16,451	-2.3%	15,209	5.6%
Disregard Traffic Signal/Sign	10,408	6.6%	10,190	2.1%	9,233	12.7%
Heavy Truck Crash	8,417	5.3%	9,857	-14.6%	8,137	3.4%
Animal-Related Crash	4,980	3.1%	5,074	-1.9%	4,640	7.3%
Alcohol-Related Driver Crash	4,236	2.7%	4,303	-1.6%	4,112	3.0%
Unrestrained Occupants	2,456	1.6%	2,728	-10.0%	2,753	-10.8%
Drowsy Driving Crash	2,370	1.5%	2,194	8.0%	1,997	18.7%
Drug-Related Driver Crash	2,340	1.5%	2,088	12.1%	1,851	26.4%
Motorcyclists	1,270	0.8%	1,217	4.4%	1,232	3.1%
Pedestrians	1,006	0.6%	1,040	-3.3%	982	2.4%
Bicyclists	655	0.4%	686	-4.5%	742	-11.7%
Deaths	281	0.2%	278	1.1%	251	11.8%
Total Crashes	62,471		60,012	4.1%	56,562	10.4%
Urban	52,611	84.2%	50,253	4.7%	47,285	11.3%
Property Damage Only	43,465	69.6%	42,089	3.3%	39,593	9.8%
Injury	18,747	30.0%	17,665	6.1%	16,742	12.0%
Followed Too Closely	14,614	23.4%	13,382	9.2%	11,925	22.6%
Teenage Driver	13,159	21.1%	12,395	6.2%	11,322	16.2%
Failed to Yield	12,011	19.2%	10,914	10.1%	10,109	18.8%
Speed	11,508	18.4%	10,507	9.5%	9,922	16.0%
Inclement Weather	11,318	18.1%	10,436	8.5%	10,833	4.5%
Rural	9,860	15.8%	9,759	1.0%	9,277	6.3%
Older (Age 65+) Driver	8,180	13.1%	7,813	4.7%	7,307	11.9%
Distracted Driving	5,748	9.2%	5,850	-1.7%	5,520	4.1%
Heavy Truck	3,498	5.6%	3,803	-8.0%	3,349	4.4%
Disregard Traffic Signal/Sign	3,450	5.5%	3,308	4.3%	3,019	14.3%
Animal-Related	3,343	5.4%	3,381	-1.1%	3,074	8.8%
Alcohol-Related Driver	1,970	3.2%	2,021	-2.5%	1,962	0.4%
Drowsy Driving	1,271	2.0%	1,178	7.9%	1,078	17.9%
Motorcycle	1,168	1.9%	1,116	4.7%	1,121	4.2%
Drug-Related Driver Crash	1,111	1.8%	986	12.7%	879	26.4%
Pedestrian-Motor Vehicle	922	1.5%	965	-4.5%	909	1.4%
Bicycle-Motor Vehicle	649	1.0%	670	-3.1%	729	-11.0%
Fatal	259	0.4%	258	0.4%	227	13.9%

* NOTE: Groups overlap and do not total 100%.

2016 Utah Fatal Crash Synopsis

Fatal Crashes						
Category	2016	% of 2016 Total*	2015	2016 % Change from 2015	3 Year Avg (2013-2015)	2016 % Change from 3 Year
Deaths	281		278	1.1%	251	11.8%
Drivers	167	59.4%	171	-2.3%	154	8.2%
Speed Crash	105	37.4%	104	1.0%	100	4.7%
Drug Positive Driver Crash	82	29.2%	85	-3.5%	62	32.3%
Unrestrained Occupants	80	28.5%	87	-8.0%	73	9.1%
Passengers	70	24.9%	53	32.1%	52	35.5%
Older (Age 65+) Driver Crash	50	17.8%	59	-15.3%	54	-6.8%
Failed to Yield Crash	45	16.0%	30	50.0%	28	62.7%
Teenage Driver Crash	45	16.0%	30	50.0%	30	51.7%
Motorcyclists	41	14.6%	36	13.9%	37	9.8%
Pedestrians	39	13.9%	49	-20.4%	39	0.9%
Drunk Driver Crash	36	12.8%	37	-2.7%	35	2.9%
Distracted Driving Crash	27	9.6%	28	-3.6%	22	20.9%
Inclement Weather Crash	27	9.6%	34	-20.6%	27	1.3%
Heavy Truck Crash	25	8.9%	42	-40.5%	28	-10.7%
Drow sy Driving Crash	20	7.1%	15	33.3%	12	71.4%
Red Light/Stop Sign Running	18	6.4%	18	0.0%	17	3.8%
Follow ed Too Closely Crash	9	3.2%	10	-10.0%	9	-3.6%
Bicyclists	5	1.8%	5	0.0%	7	-25.0%
Animal-Related Crash	1	0.4%	1	0.0%	2	-50.0%
Fatal Crashes	259		258	0.4%	227	13.9%
Urban	162	62.5%	160	1.3%	138	17.1%
Speed	98	37.8%	95	3.2%	90	8.9%
Rural	97	37.5%	98	-1.0%	89	9.0%
Drug Positive Driver	77	29.7%	75	2.7%	54	42.6%
Older (Age 65+) Driver	48	18.5%	57	-15.8%	49	-2.0%
Failed to Yield	43	16.6%	27	59.3%	26	67.5%
Teenage Driver	42	16.2%	27	55.6%	27	57.5%
Motorcycle	40	15.4%	36	11.1%	37	8.1%
Pedestrian-Motor Vehicle	38	14.7%	49	-22.4%	38	-0.9%
Drunk Driver	32	12.4%	31	3.2%	30	5.5%
Inclement Weather	26	10.0%	33	-21.2%	24	6.8%
Distracted Driving	25	9.7%	27	-7.4%	20	23.0%
Heavy Truck	23	8.9%	35	-34.3%	25	-6.8%
Red Light/Stop Sign Running	16	6.2%	18	-11.1%	17	-4.0%
Drow sy Driving	14	5.4%	14	0.0%	10	35.5%
Follow ed Too Closely	9	3.5%	8	12.5%	9	3.8%
Bicycle-Motor Vehicle	5	1.9%	5	0.0%	6	-21.1%
Animal-Related	1	0.4%	1	0.0%	2	-40.0%

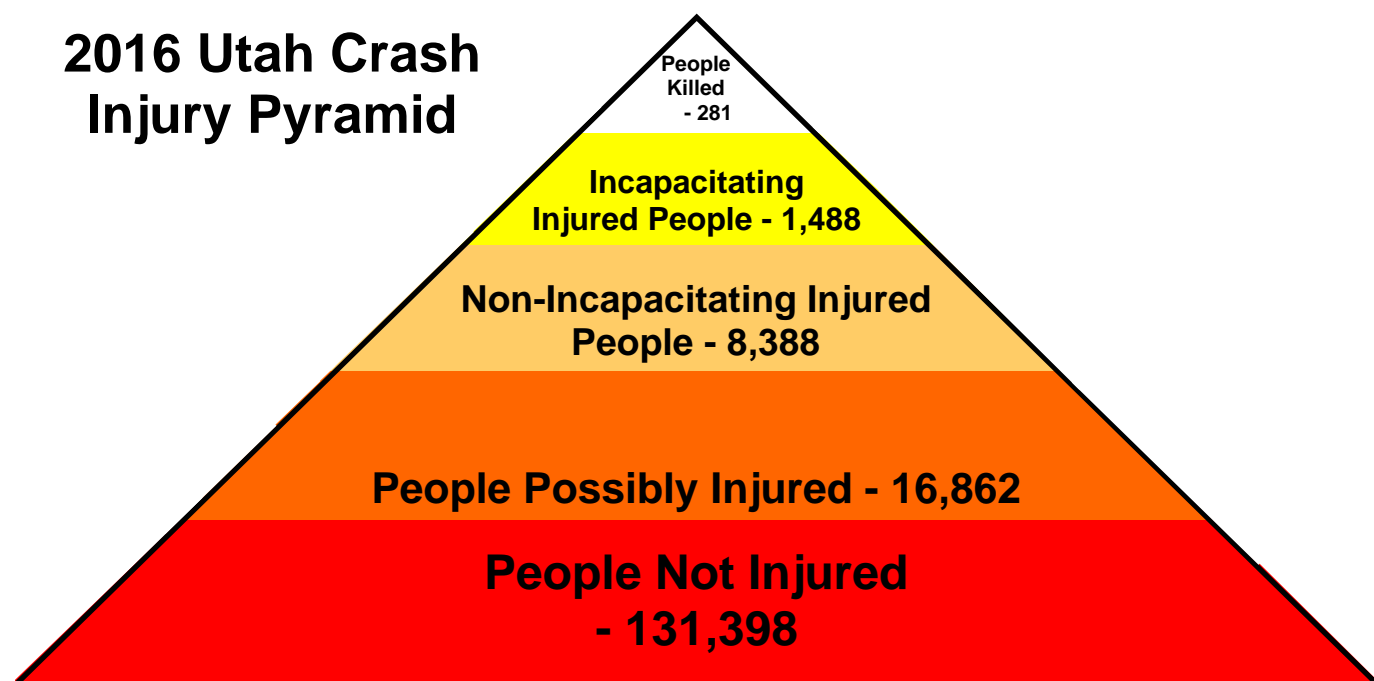
* NOTE: Groups overlap and do not total 100%.

2016 Utah Odds Ratios of Fatality

Odds Ratio of Fatality for Selected Crash Factors	
Factor	Odds Ratio
Restraint Use - Unrestrained vs Restrained	24.5
Pedestrian Crash	11.9
Motorcycle Crash	9.9
Travel Speed - 80+ MPH	9.1
Vehicle Maneuver - Overtaking/Passing	5.8
First Harmful Event - Overturn/Rollover	5.6
Speed Limit - 80 MPH	5.2
Travel Speed - Over Posted Speed Limit	5.2
Alcohol-Related Crash	4.4
Location - Rural County	3.2
Age - 65+ Years	2.8
Drowsy Driver Crash	2.8
Manner of Collision - Head On	2.8
Speed Crash	2.7
Vehicle Type - Heavy Truck	2.1
Driver Gender - Male	2.0
Gender - Male	1.9
Day of Week - Weekend	1.6
Light Condition - Dark	1.6
Older Driver Crash	1.5
Road Surface Condition - Dry	1.4
Driver License State - Outside Utah	1.3
Vehicle Type - Pickup Truck	1.3
Distracted Driver Crash	1.1

- An odds ratio (OR) is a measure of association between an exposure and an outcome. ORs are used to compare the relative odds of the occurrence of the outcome of interest (e.g. death), given exposure to the variable of interest (e.g. unrestrained, drowsy, male).
- If the OR=1, then the exposure does not affect odds of outcome. If the OR is less than 1, then exposure associated with lower odds of outcome. If the OR is greater than 1, then exposure is associated with higher odds of outcome. Note that this does not establish that the exposure is the cause of the outcome as it could be that the association is due to a third property—a confounding factor.
- This table shows some of the OR that were greater than 1 for fatalities of selected crash factors.
- Being unrestrained versus being restrained had the highest OR of dying in a crash.
- Pedestrian crash, motorcycle crash, and a vehicle traveling 80+ MPH were the next highest OR for having a death in a crash.

2016 Utah Crash Injury Pyramid



2016 Utah Crash Facts

- In an average day in Utah, there were 171 motor vehicle crashes involving 433 people with 73 people injured and 0.8 person killed.
- First motor vehicle crash occurred January 1, 2016 at 12:05 a.m. and the last crash occurred December 31, 2016 at 11:52 p.m.
- First fatal motor vehicle crash occurred January 1, 2016 at 1:00 p.m. and the last fatal crash occurred December 31, 2016 at 1:49 p.m.
- Tuesday, November 28, 2016 had the most crashes with 507 crashes and Sunday, February 28, 2016 had the fewest crashes with 58.
- 107 lives were estimated to be saved at current seat belt use rates. (National Highway Traffic Safety Administration)
- It is estimated that 40 additional lives would have been saved if everyone had been wearing seat belts.
- A motor vehicle crash occurred every 8 minutes.
- A person was injured in a crash every 19 minutes.
- A teenage-driver crash occurred every 40 minutes.
- A speed-related crash occurred every 45 minutes.
- A driver age 65 years or older was in a crash every 64 minutes.
- A distracted driver crash occurred every 91 minutes.
- A heavy truck was in a crash every 2.5 hours.
- An animal-motor vehicle crash occurred every 2.5 hours.
- An alcohol-related driver crash occurred every 4 hours.
- A drowsy driver crash occurred every 6.5 hours.
- A motorcyclist was in a crash every 6.5 hours.
- A drug-related driver crash occurred every 7.5 hours.
- A pedestrian was hit by a motor vehicle every 8.5 hours.
- A bicyclist was hit by a motor vehicle every 13 hours.
- A person died in a crash every 31 hours.
- The youngest person in a motor vehicle crash was less than a week old and the oldest person was 101 years-old.
- The youngest person killed in a motor vehicle crash was 3 months-old and the oldest person killed was 91 years-old.
- The estimated statewide economic loss due to motor vehicle crashes in Utah was \$1.8 billion. (National Highway Traffic Safety Administration)
- Hospital and emergency department charges for the treatment of injuries in motor vehicle crashes were \$157 million. [Utah Department of Health (UDOH), 2014]
- 5.5% of licensed drivers were in a crash.
- 5.2% of Utah residents were in a crash.
- 5.0% of registered vehicles were in a crash.
- 1.5% of deaths in Utah involved a motor vehicle crash. (UDOH)
- 0.2% of people in a crash died.
- A person was in a crash every 194,000 miles driven in Utah.



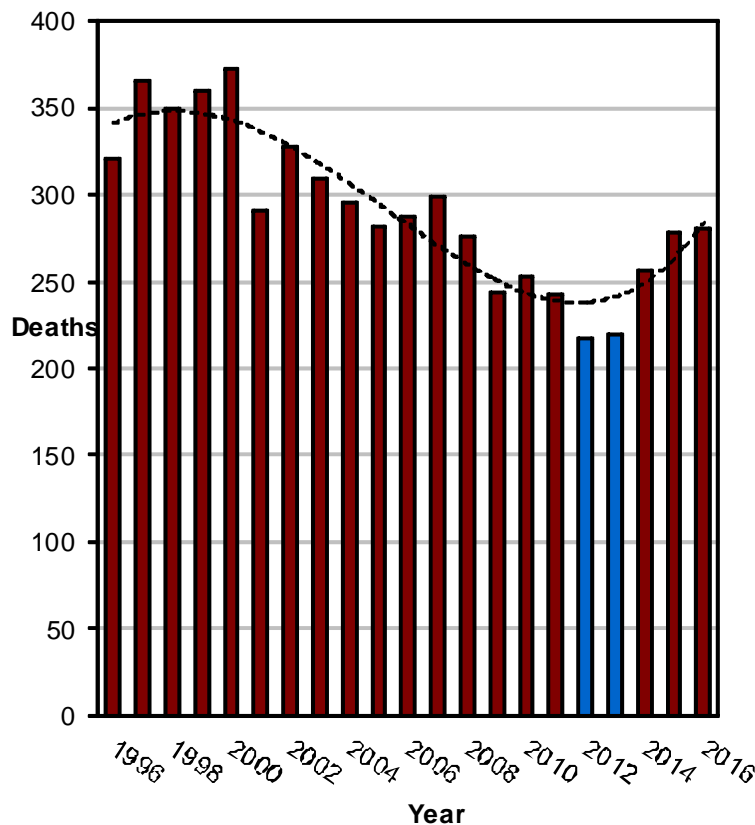
Overview



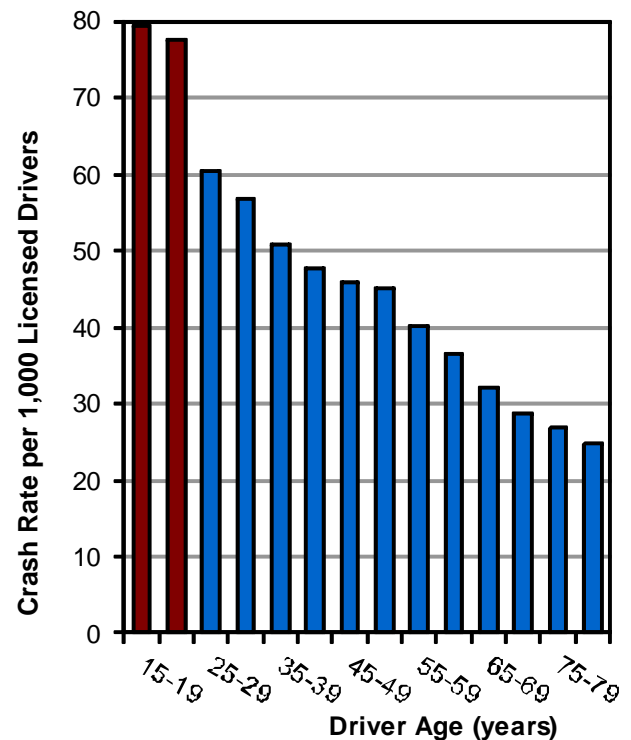
Did you know in 2016:

- 62,471 motor vehicle crashes occurred in Utah which resulted in 26,738 injured persons and 281 deaths.
- The Utah death rate per mile traveled was lower than the U.S. rate.
- A motor vehicle crash occurred in Utah every 8 minutes, a person was injured in a crash every 19 minutes, and a person died in a crash every 31 hours.

Deaths by Year (Utah 1996-2016)



Crash Rates per Licensed Drivers by Age (Utah 2016)



- Traffic crash deaths increased for the 4th straight year.

- Drivers aged 15-24 years had the highest crash rates per licensed driver.

Crash Summary (Utah 2016)

Leading Causes of All Crashes

1. Followed Too Closely (24%)
2. Failed to Yield (20%)
3. Speed (15%)
4. Failed to Keep in Proper Lane (13%)
5. Distracted Driving (9%)

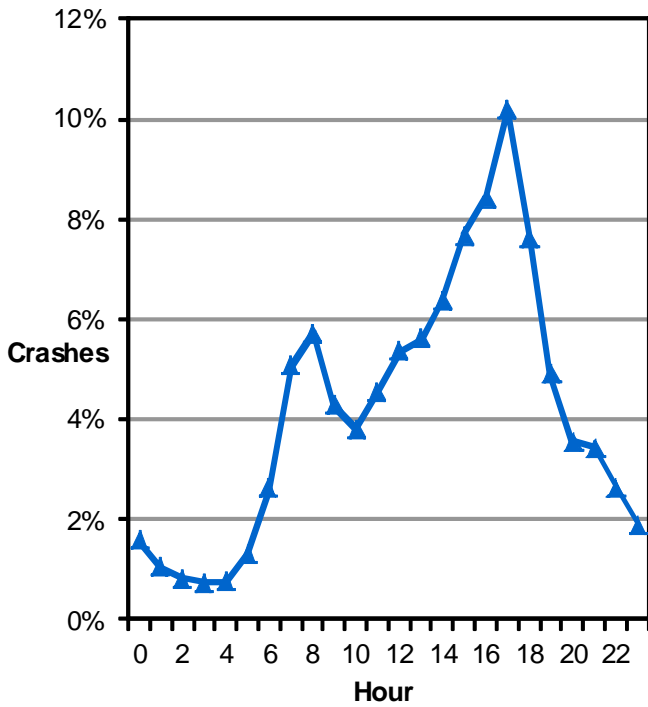
Leading Causes of Death

1. Speed (37%)
2. Unrestrained Occupants (28%)
3. Failed to Yield (16%)
4. Drunk Driving (13%)
5. Overcorrected (11%)

Overview



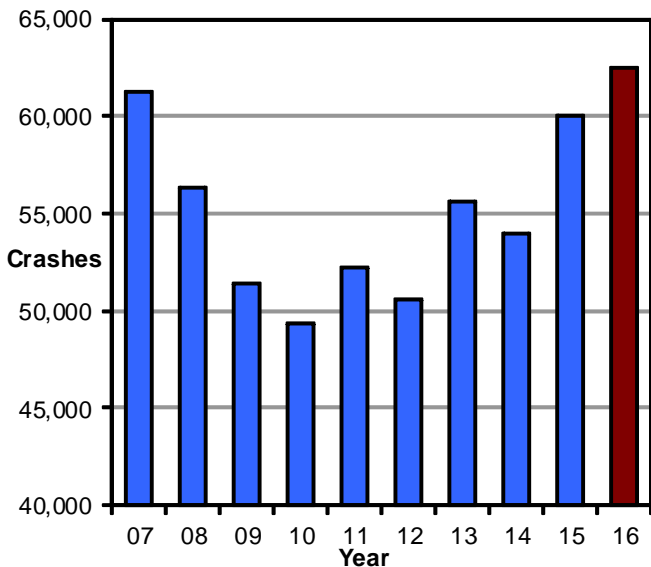
Motor Vehicle Crashes by Hour (Utah 2016)



- Crashes were highest between 3:00 p.m. and 6:59 p.m.

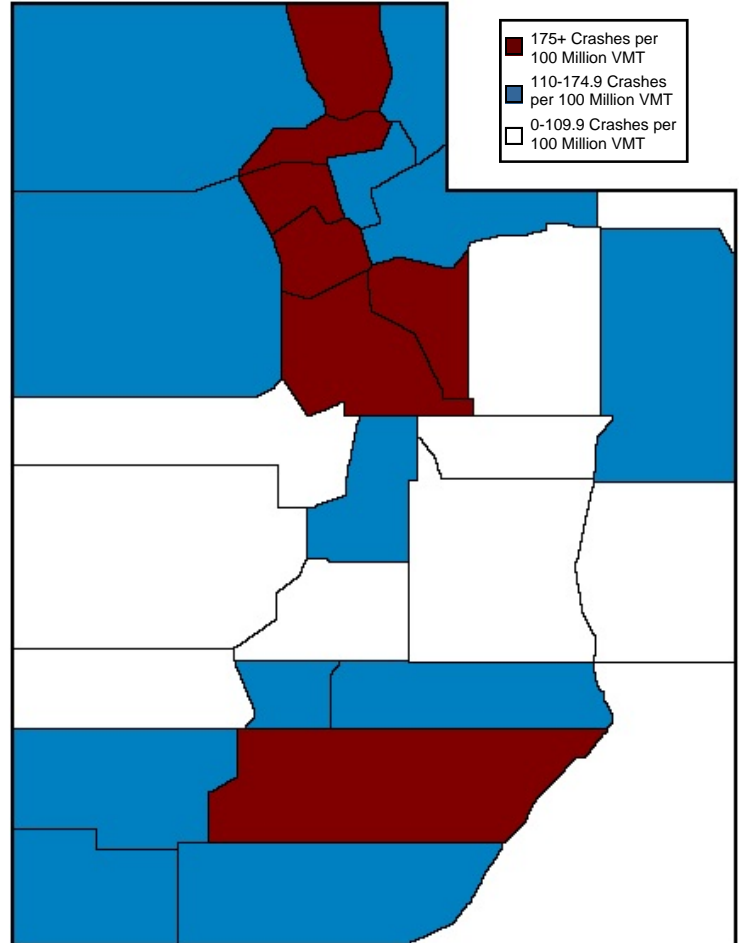
Traffic crashes in 2016 were the highest ever in Utah. Traffic deaths were the highest in Utah since 2007.

Traffic Crashes by Year (Utah 2007-2016)



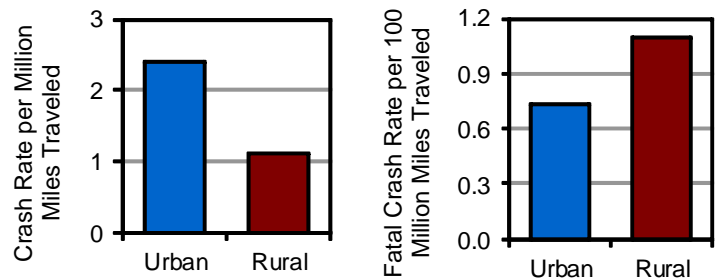
- 2016 saw an all time high for traffic crashes.

County Crash Rates by Miles Traveled (Utah 2016)



- Salt Lake, Weber, and Cache Counties had the highest crash rates per miles traveled.

Urban/Rural Location (Utah 2016)



- Urban areas had a higher rate of total crashes per vehicle mile traveled while rural areas had a higher fatal crash rate.
- Rural crashes were 3.2 times more likely to be fatal than urban crashes.

Wearing a seat belt is one of the best ways to decrease injuries and deaths in motor vehicle crashes.

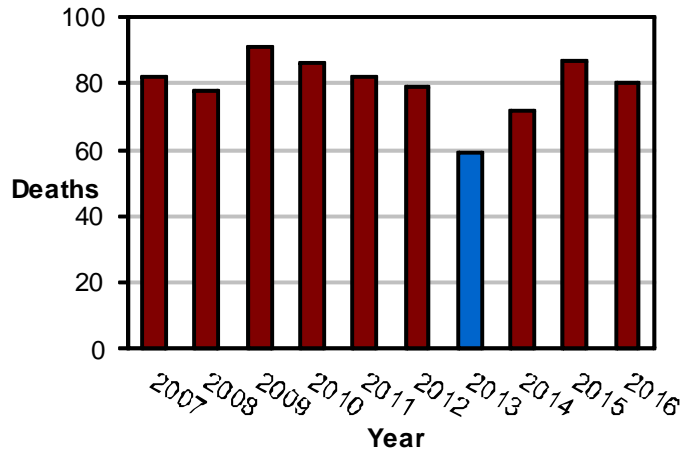
Occupant Protection



Did you know in 2016:

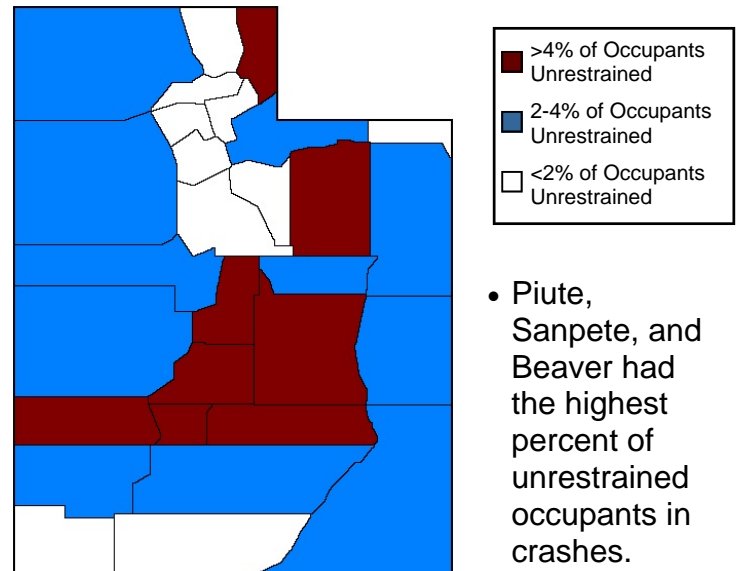
- Unrestrained crash occupants were 24 times more likely to die than restrained injured occupants.
- An estimated 107 lives were saved because of restraint use. (National Highway Traffic Safety Administration)
- An estimated 40 additional lives would have been saved if everyone had been wearing seat belts.

Unrestrained Occupant Deaths by Year (Utah 2007-2016)



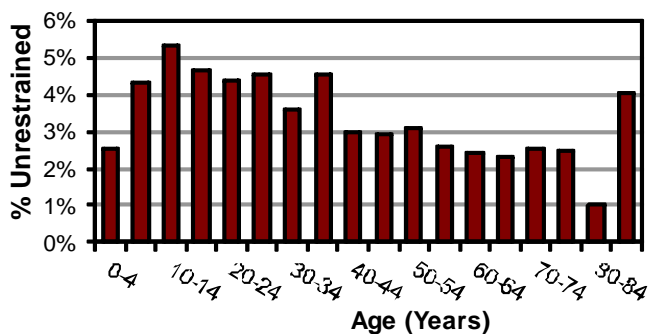
- 2013 had the lowest number of unrestrained occupant deaths over the last 10 years.

Unrestrained Crash Occupants by County (Utah 2016)



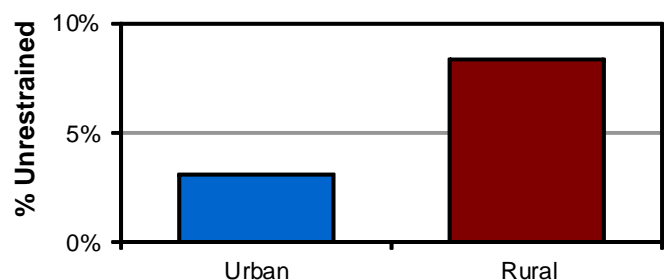
- Piute, Sanpete, and Beaver had the highest percent of unrestrained occupants in crashes.

Unrestrained Injured Crash Occupants by Age (Utah 2016)



- The highest percentage of unrestrained injured crash occupants were 10-14 years.

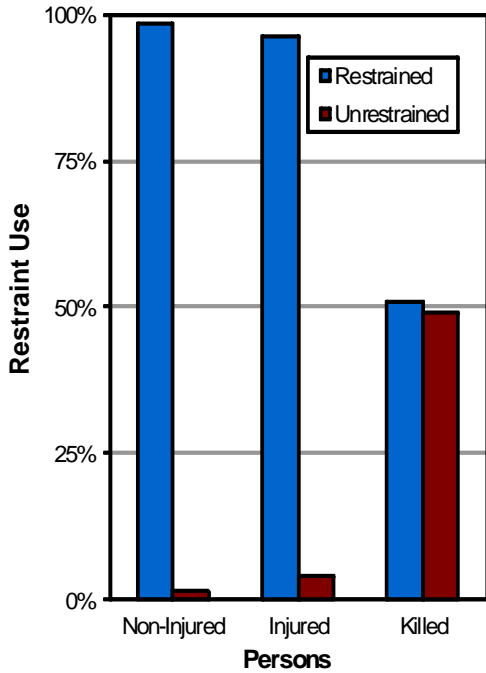
Unrestrained Injured Crash Occupants by Rural vs. Urban (Utah 2016)



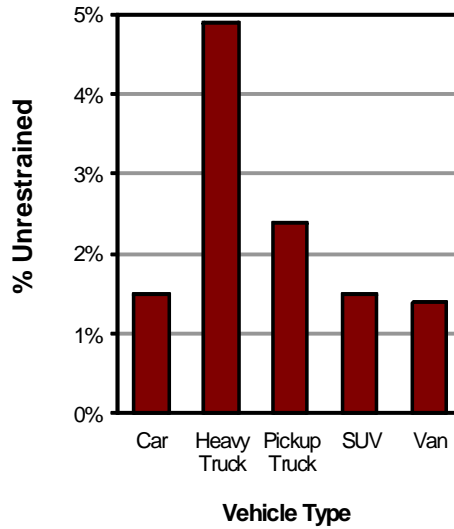
- Occupants in rural crashes were 2.3 times more likely to be unrestrained than urban occupants.



Restraint Use by Injury Severity (Utah 2016)



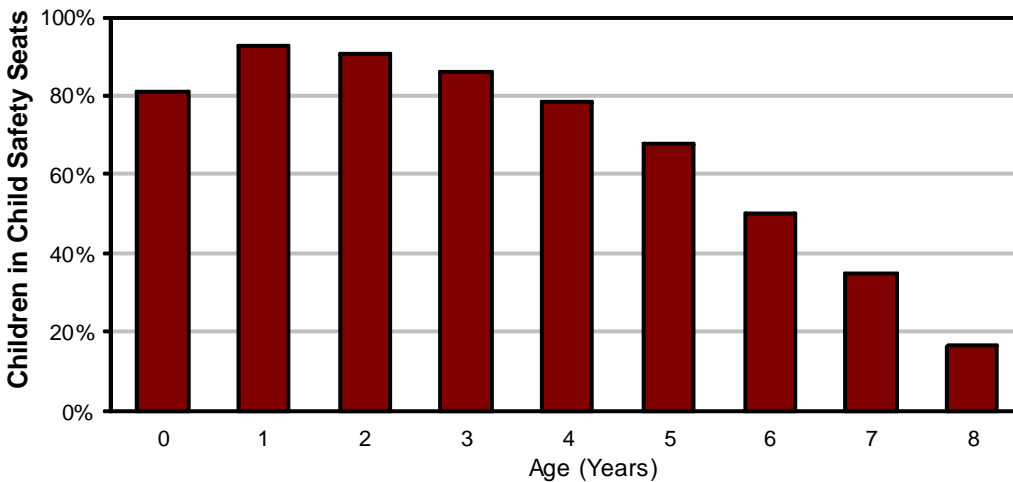
Restraint Use by Vehicle Type (Utah 2016)



- 98% of persons who survived a crash were restrained compared to half (49%) of the persons killed.

- Occupants in heavy truck and pickup truck were the most likely to be unrestrained in a crash.

Percent of Children Aged 0-8 Years in Crashes Using Child Safety Seats (Utah 2016)



- The older the child the less likely they were using a child safety seat.
- While 93% of 1-year-olds in a crash were in a child safety seat, only 78% of 4-year-olds, 68% of 5-year-olds, 50% of 6-year-olds, and 35% of 7-year-olds were in a child safety seat.
- The decrease in child safety seat use for children aged 4-8 years is concerning and indicates that children are moving to adult-sized seat belts too early.

Child Safety Seat Recommendations:

- Children should ride rear-facing until at least two years of age and 30 pounds.
- Children should ride forward-facing with a harness until at least four years of age and 40 pounds, or longer if the car seat allows.
- Children who are at least four years of age and 40 pounds can ride in a booster seat. Use the booster seat until the seat belt fits correctly and until the child is 4'9".
- Children under 13 years old should ride in the back seat.
- Never place a rear-facing child safety seat in the front seat of a vehicle with a passenger side air bag.

Seat Belt Recommendations:

Recommendations:

- Always use both the lap and shoulder belt. When worn properly, the shoulder belt should fit across the collar bone and the lap belt should fit low over the hips.
- Never place the shoulder strap under the arm or behind the back.
- Always buckle up to stay safe and set a good example.

Safety Restraint Laws:

- Utah law requires all motor vehicle occupants to wear a seat belt.
- Children age 7 years and under must ride in an approved child safety seat.



2016 Utah Crash Facts



Speed is the leading unsafe driving behavior that contributes to deaths.

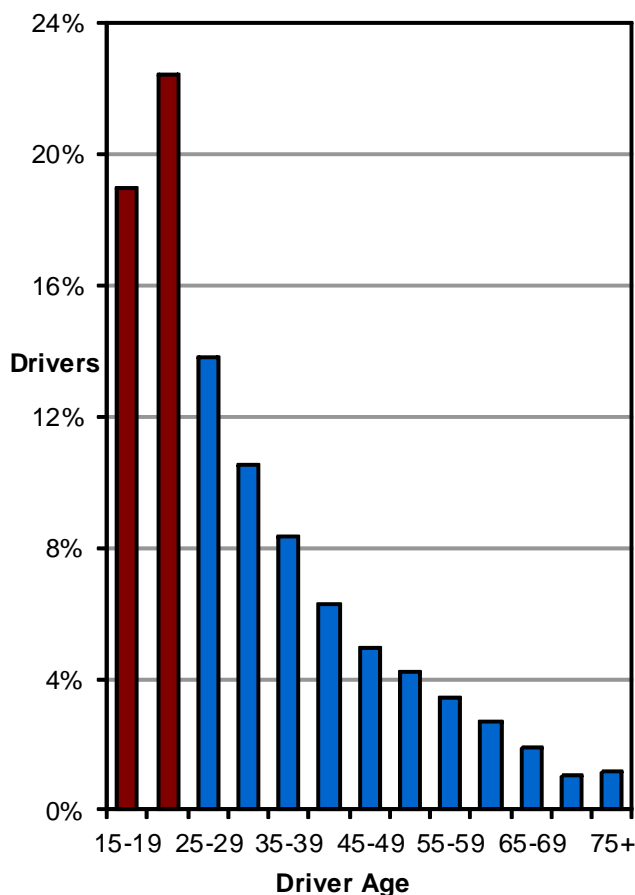
Speed



Did you know in 2016:

- 11,508 speed-related crashes occurred in Utah which resulted in 5,550 injured persons and 105 deaths.
- Speed was a factor in 38% of fatal crashes.
- Speed-related crashes were 2.7 times more likely to be fatal than other motor vehicle crashes.

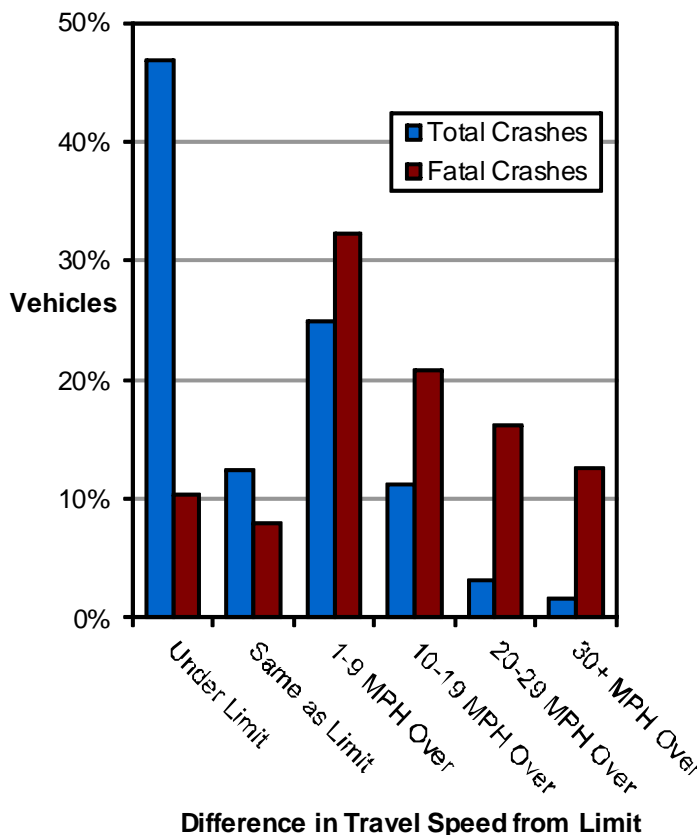
Age of Drivers in Speed-Related Crashes (Utah 2016)



- Drivers aged 15-24 years had the highest percentage of total speed-related crashes.

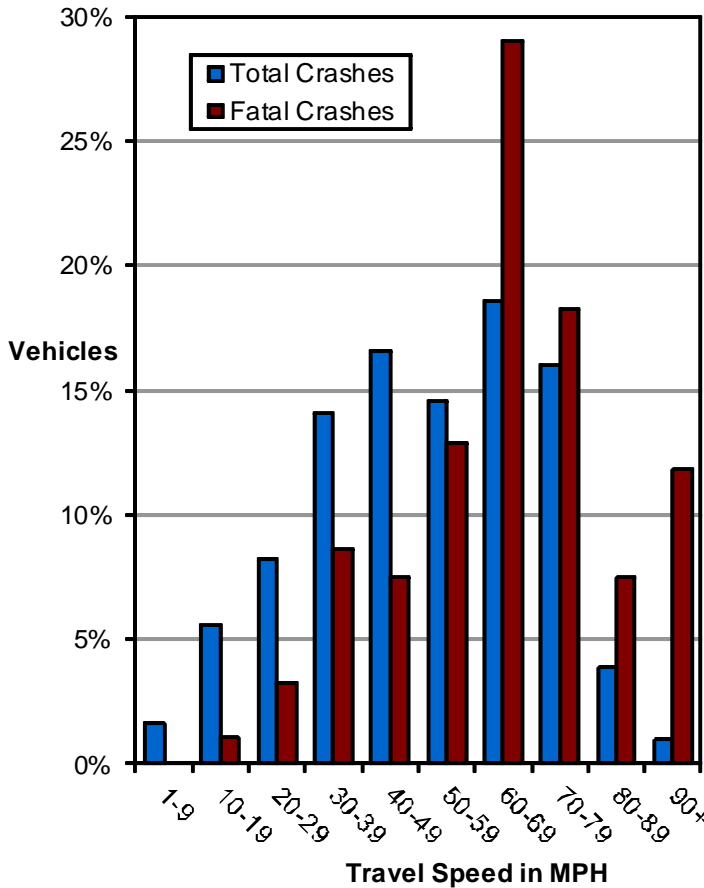


Speed-Related Crashes by Difference in Travel Speed From Speed Limit (Utah 2016)



- Speed-related vehicles in fatal crashes were more likely to be exceeding the posted speed limit by greater amounts.
- Drivers become increased risks to themselves and other people on the roadway due to higher speeds.

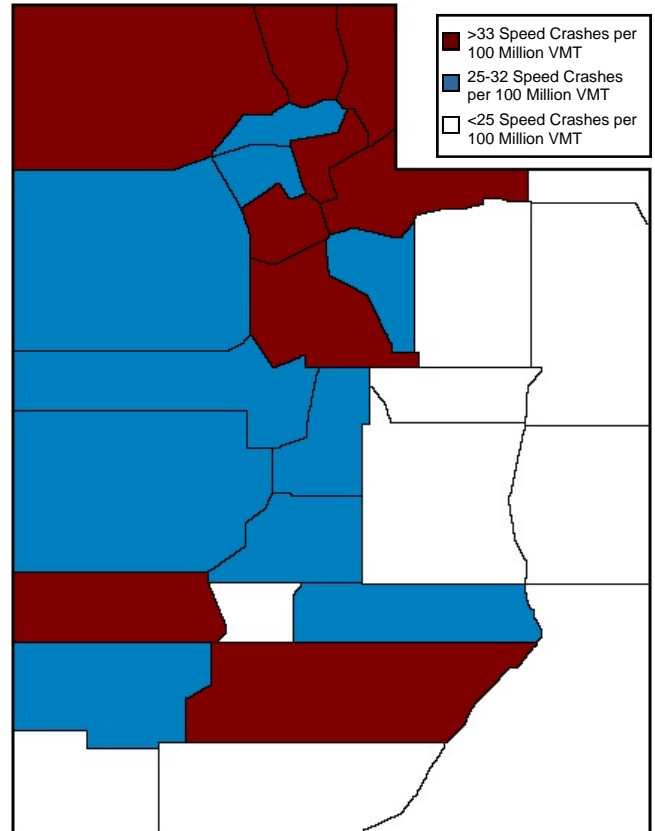
Speed-Related Crashes by Travel Speed (Utah 2016)



Speed



Speed-Related Crash Rates by County (Utah 2016)



- Speed-related vehicles in fatal crashes were more likely to be traveling at higher speeds.
- The higher the speed the greater the amount of energy that must be absorbed in a crash, hence there is more chance of serious injury or death.

- Wasatch, Salt Lake, Morgan, Box Elder, and Rich Counties had the highest speed-related crash rates per miles traveled.

Speeding is one of the leading factors contributing to traffic crashes. Speeding is dangerous because it:

- Magnifies drivers' errors;
- Extends the distance necessary to stop a vehicle;
- Increases the distance a vehicle travels while the driver reacts to a situation;
- Reduces a driver's ability to steer safely around curves or objects in the road;
- Decreases the effectiveness of vehicle design features, such as seat belts;
- Reduces the stability of the vehicle structure;
- Increases the number of crashes;
- Increases the severity of crashes. For every 10 MPH over 50 MPH, the risk of death in a crash is doubled.



Drivers need to remember there is a reason for speed limits. The roadways are a dangerous place and the speed limits are designed to protect everyone—drivers, passengers, bicyclists, and pedestrians. The posted speed limit is the law. Slow down and obey speed limits.

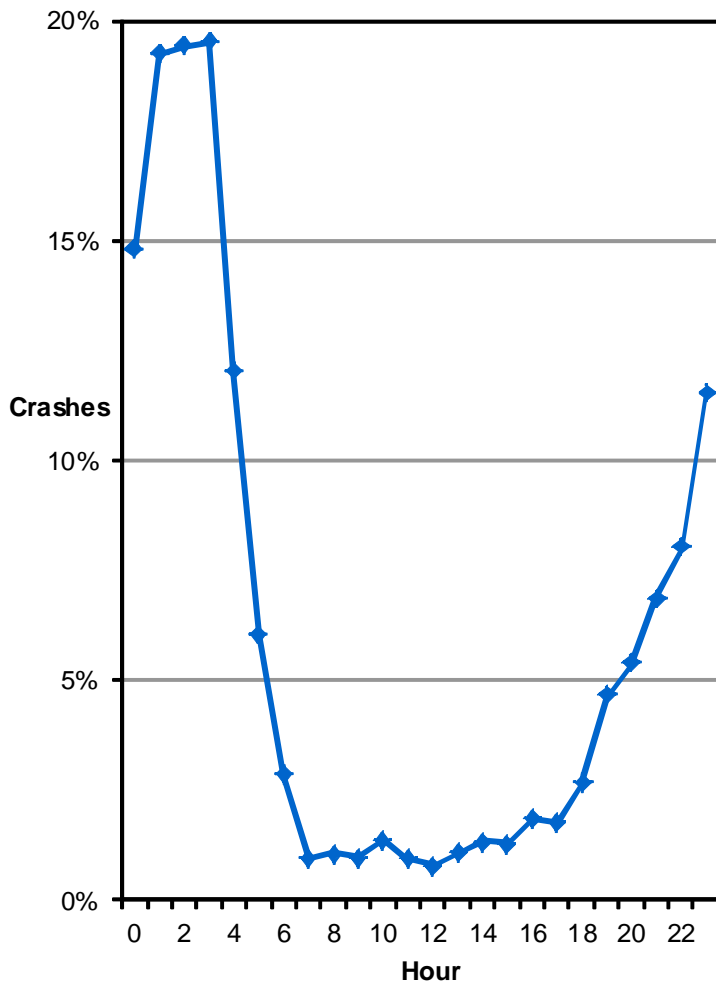
Did you know in 2016:

- 1,970 alcohol-related driver crashes occurred in Utah which resulted in 1,220 injured persons and 36 deaths.
- Alcohol-related driver crashes were 4.3 times more likely to be fatal than other crashes.
- 3.2% of crashes involved an alcohol-related driver.

Alcohol

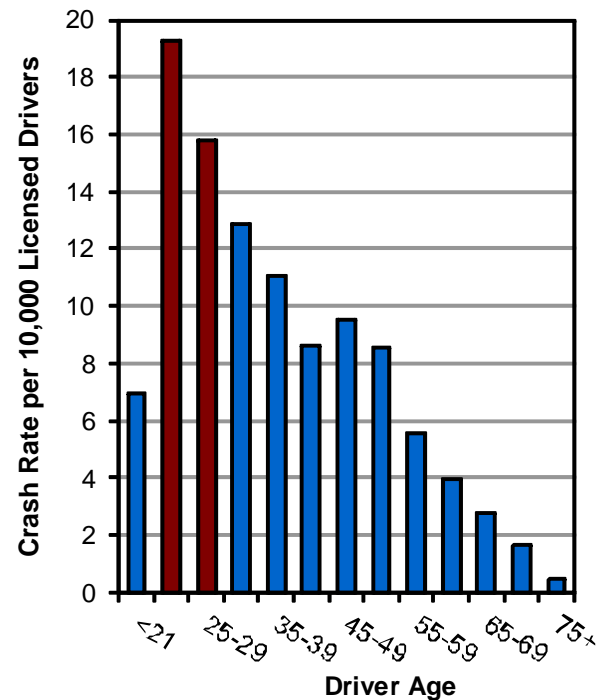


Percent of Total Crashes with an Alcohol-Related Driver by Hour (Utah 2016)



- While 3% of total crashes involved an alcohol-related driver, 15% of crashes occurring during the hours of 11:00 p.m.-4:59 a.m. involved an alcohol-related driver.

Rate of Alcohol-Related Drivers in Crashes per Licensed Driver (Utah 2016)



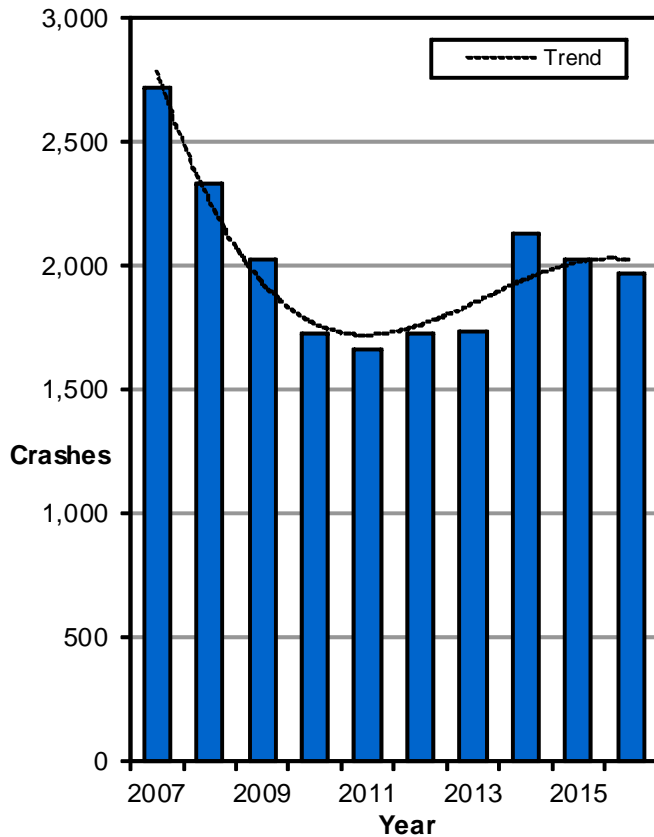
- Drivers aged 21 to 24 years had the highest rates of alcohol-related crashes.
- 157 (8%) of the drivers were under the age of 21 years.



Previous DUI (Utah 2016)

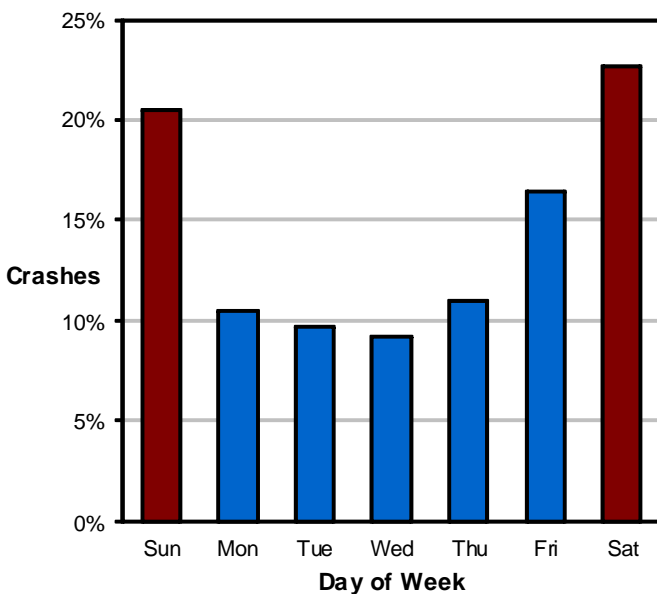
- 9% of the drunk drivers in fatal crashes were previously convicted of driving under the influence in the past five years.

**Alcohol-Related Driver Crashes
(Utah 2007-2016)**



- The number of alcohol-related driver crashes decreased for the 2nd straight year.

**Alcohol-Related Driver Crashes
by Day of the Week (Utah 2016)**

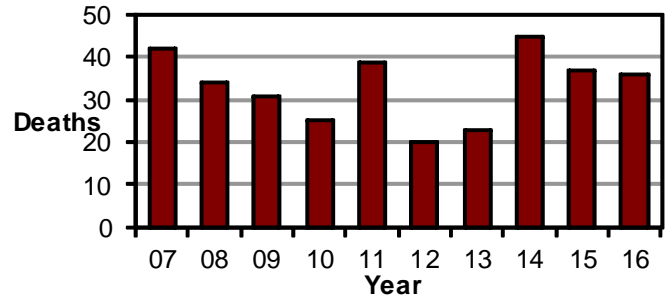


- The highest percentage of alcohol-related driver crashes occurred on weekends (43%).

Alcohol

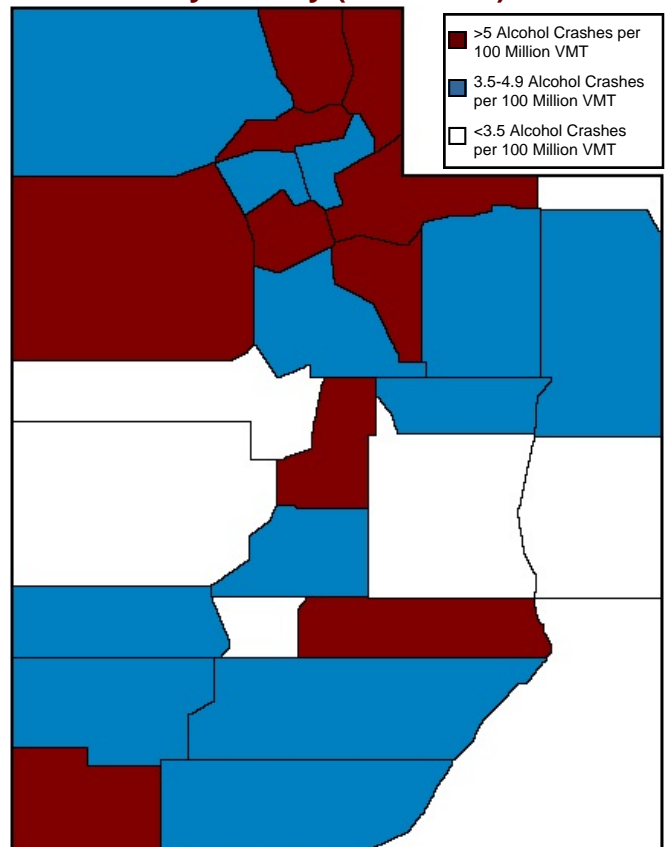


**Deaths from Drunk Drivers
(Utah 2007-2016)**



- The 45 deaths in 2014 was the highest amount since 56 deaths in 2004.

**Alcohol-Related Driver Crashes
by County (Utah 2016)**

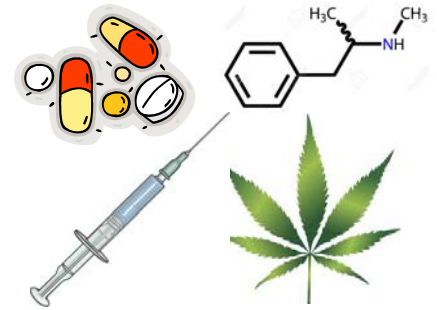


- Salt Lake, Weber, and Tooele Counties had the highest rates of alcohol-related driver crashes per vehicle miles traveled (VMT).
- Daggett, Grand, and Juab Counties had the lowest rates of alcohol-related driver crashes per VMT.

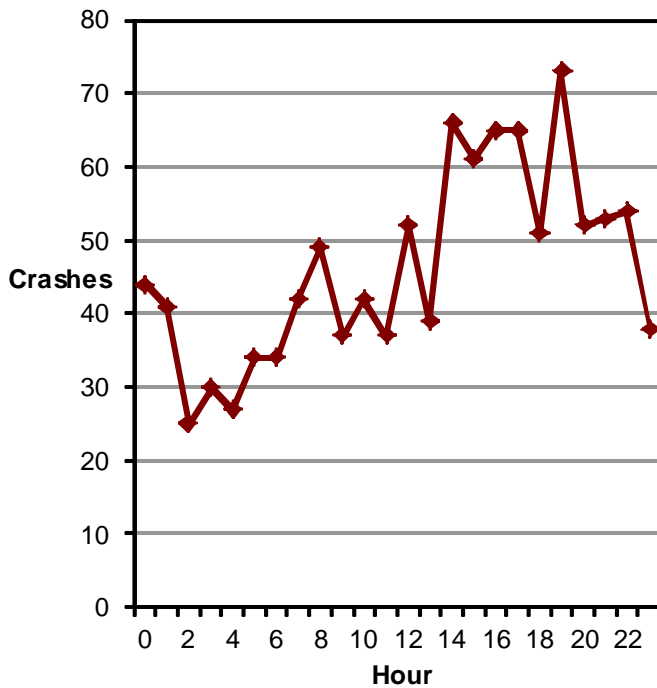
Did you know in 2016:

- 1,111 drug-related driver crashes occurred in Utah which resulted in 753 injured persons.
- There were 82 deaths involving a drug positive driver.*
- Drug-related driver crashes increased 13% in 2016 from 2015.

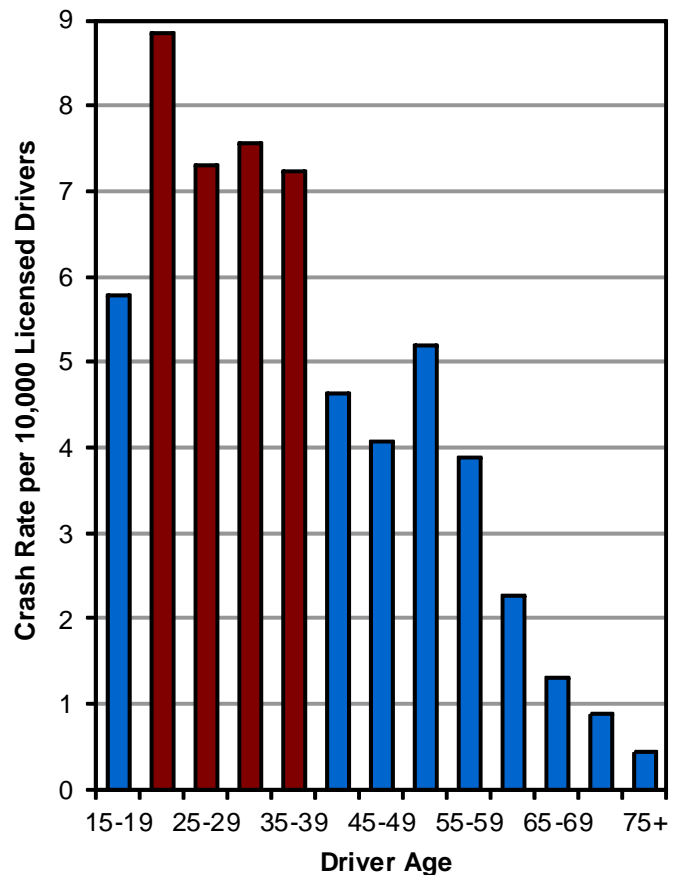
Drugs



Drug-Related Driver Crashes by Hour (Utah 2016)



Rate of Drug-Related Drivers in Crashes per Licensed Driver (Utah 2016)



- Drug-related driver crashes were highest during the hours of 2 pm-7:59 pm.

*Drug presence does not necessarily imply impairment. For many drug types, drug presence can be detected long after any impairment that might affect driving has passed. Also, whereas the impairment effects for various concentration levels of alcohol is well understood, little evidence is available to link concentrations of other drug types to driver performance.

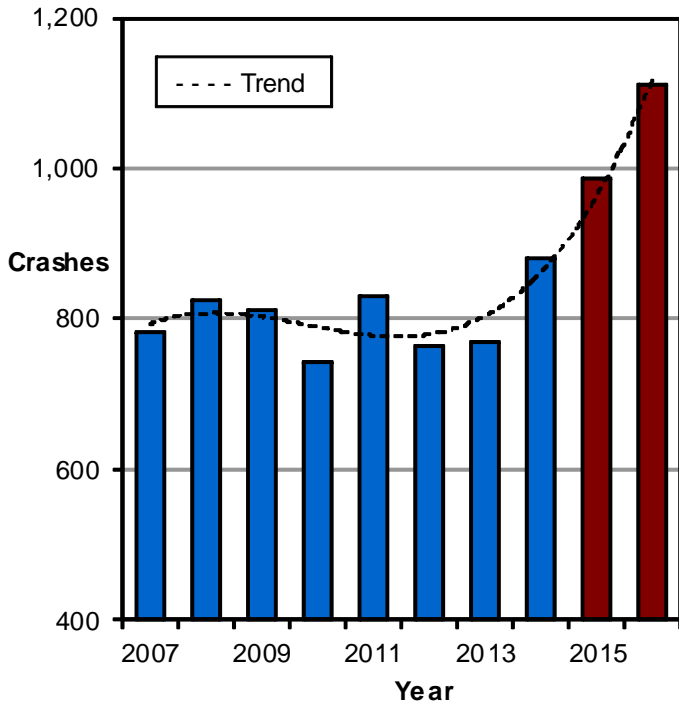
Note: A non-fatal crash is considered drug-related when the driver was cited for driving under the influence of drugs, at least one driver had a positive drug test, or if the investigating officer suspected the driver used drugs. A drug-positive driver fatal crash is a crash resulting in one or more deaths involving at least one driver with a positive drug test.

- Drivers aged 20 to 39 years had the highest rates of drug-related crashes.



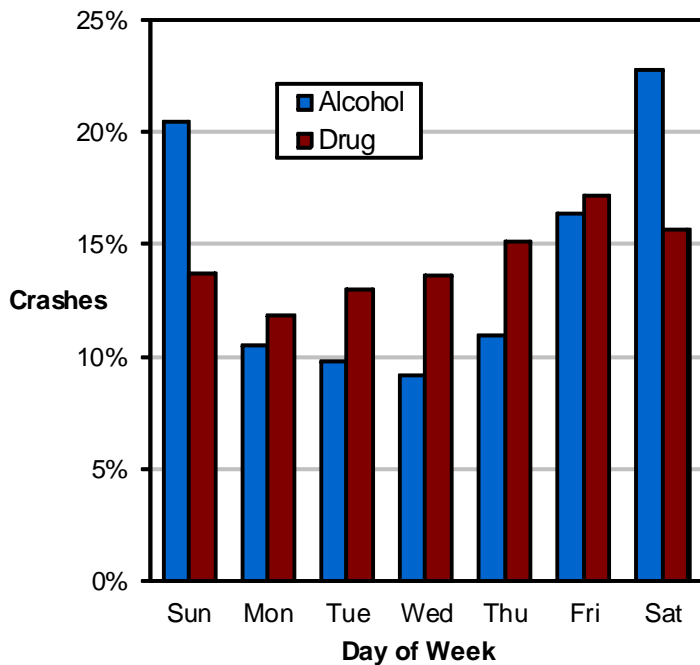
Drugs

Drug-Related Driver Crashes by Year (Utah 2007-2016)



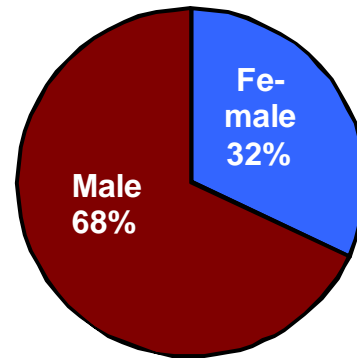
- The number of drug-related driver crashes in 2016 was the highest it has ever been.

Drug-Related vs. Alcohol-Related Driver Crashes by Day of the Week (Utah 2016)



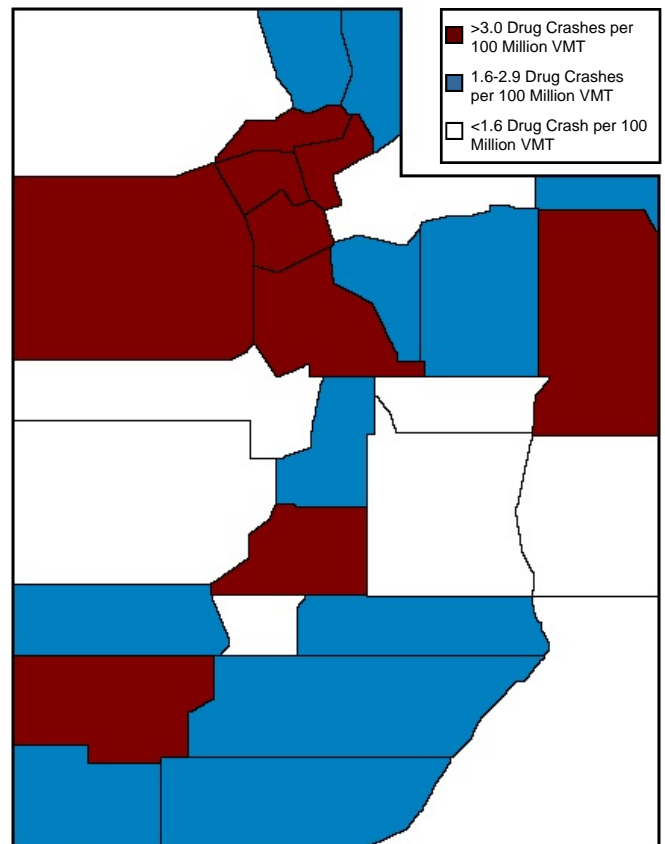
- While alcohol-related driver crashes occurred more on weekends, drug-related driver crashes were spread throughout the week.

Drug-Related Driver Crashes by Driver Gender (Utah 2016)



- There were twice as many male drivers in drug-related crashes than females.

Drug-Related Driver Crashes by County (Utah 2016)



- Weber, Salt Lake, and Sevier Counties had the highest rates of drug-related driver crashes per vehicle mile traveled (VMT).

2016 Utah Crash Facts

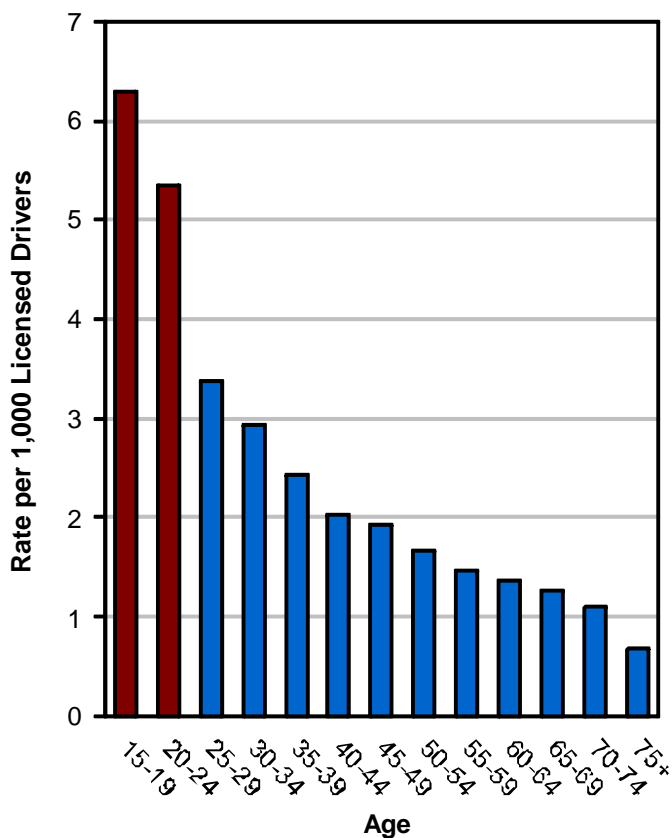
Distraction



Did you know in 2016:

- 5,748 distracted driver crashes occurred in Utah which resulted in 3,303 injured persons and 27 deaths.
- 9% of all crashes in Utah involved a distracted driver.
- Over half (54%) of distracted driving crashes were rear end crashes.

Distracted Driver Crash Rates per Licensed Driver by Age (Utah 2016)



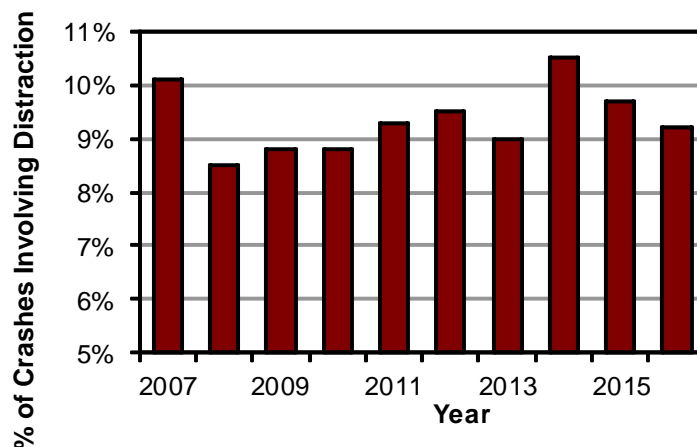
- Younger drivers had the highest rates of driver distraction crashes.

Distracted Driving Crashes by Distraction Type (Utah 2016)

1. Cell Phone (15%)
 2. Other Inside Distraction (11%)
 3. Passengers (11%)
 4. Other External Distraction (10%)
 5. Radio/CD/DVD etc. (8%)
 6. Other Electronic Device (3%)
 7. Texting (1%)
- Other (41%)



Percent of Crashes Involving Distracted Drivers by Year (Utah 2007-2016)



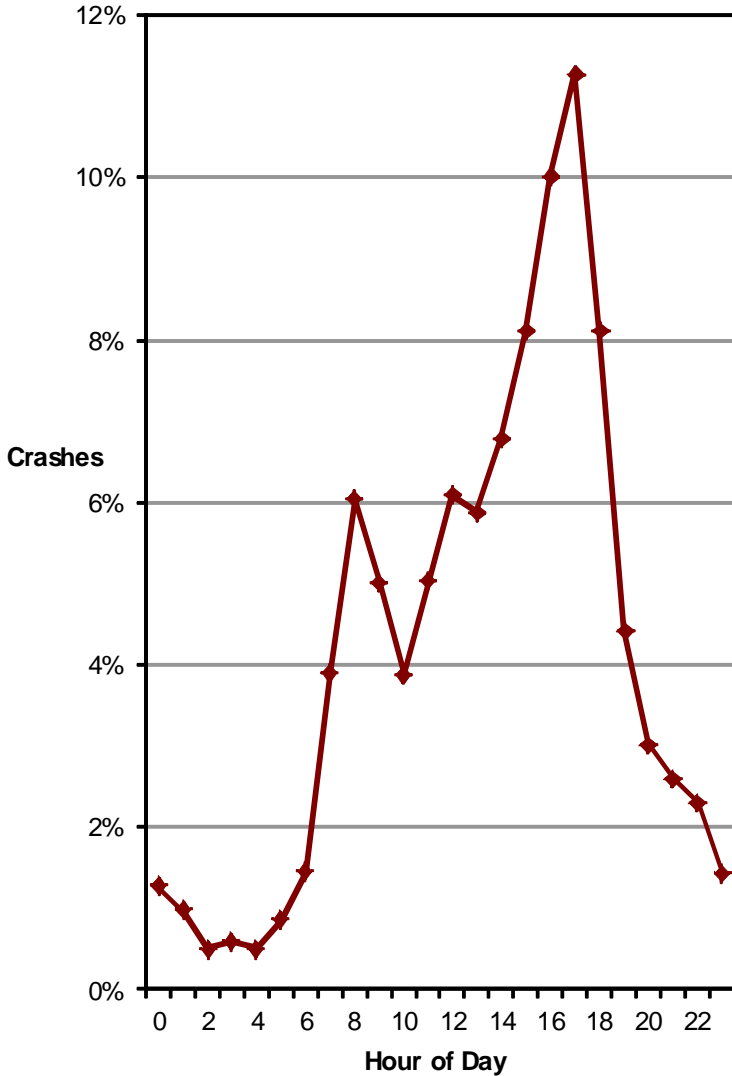
- The percent of crashes involving a distracted driver has hovered around 9.4%.

While these numbers are significant, they may not state the true size of the problem, since the identification of distraction and its role in the crash by law enforcement can be very difficult.

Driving is a multitask job and demands the full attention of the driver.

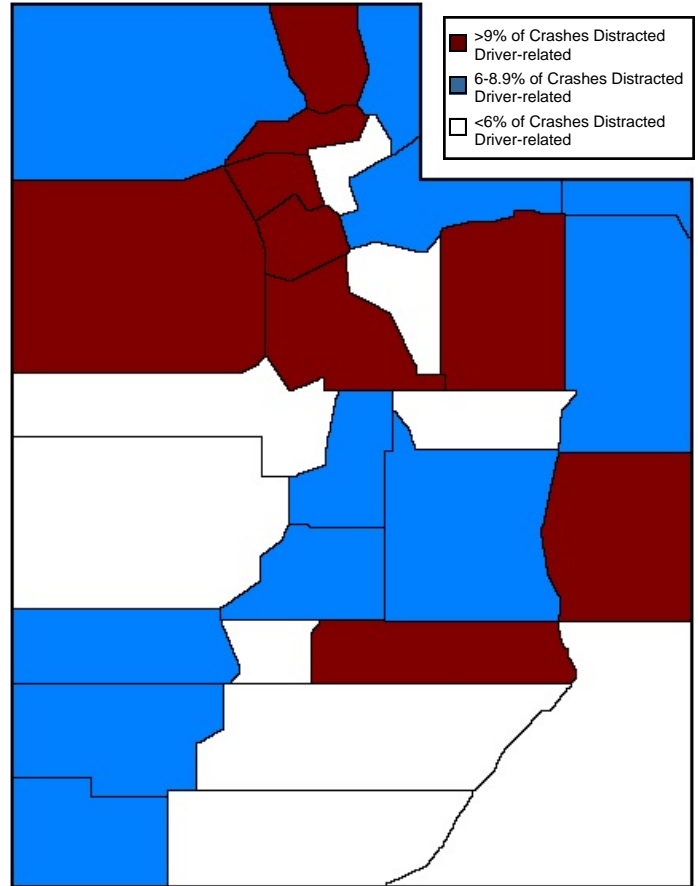
Driver Distraction Crashes by Hour (Utah 2016)

Distraction



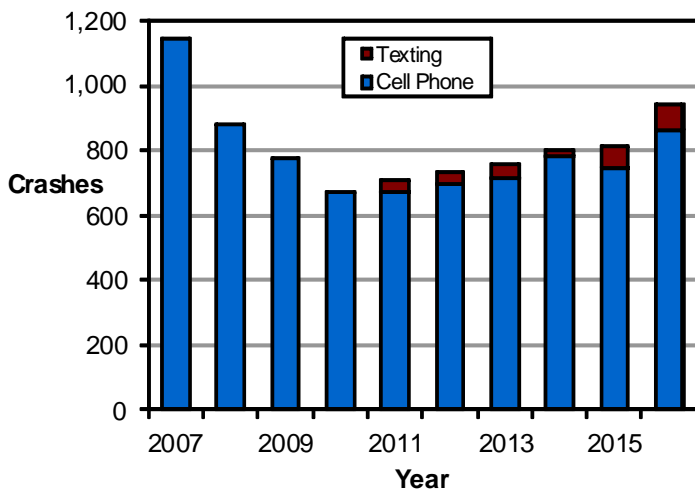
- Driver distraction crashes peaked during the hours of 4:00 p.m.-6:59 p.m.

Distracted Driver Crashes by County (Utah 2016)



- Cache, Utah, Weber, and Grand Counties had the highest percent of crashes that involved a distracted driver.

Crashes Involving Drivers on Cell Phones and Texting (Utah 2007-2016)



- In 2007, a law was passed prohibiting hand-held telephone use which could only be enforced if a moving traffic violation was committed.
- In 2009, a law was passed prohibiting texting while operating a moving motor vehicle.
- In 2011, texting was added to the distracted driving options on the police traffic crash report.
- Crashes involving drivers on cell phones decreased for three years after the 2007 law was passed.
- Crashes involving drivers on cell phones have increased for six straight years.

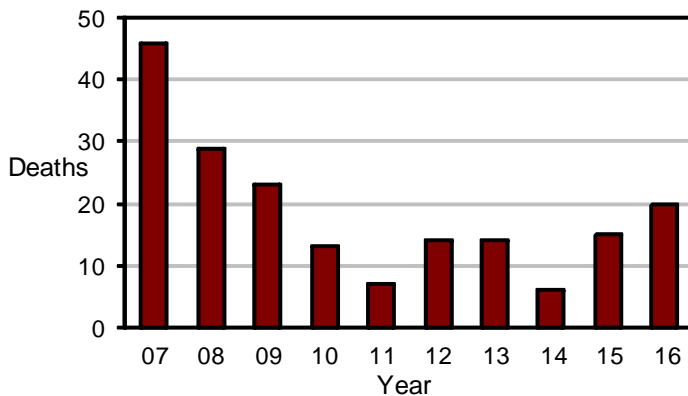
Drowsy Driving



Did you know in 2016:

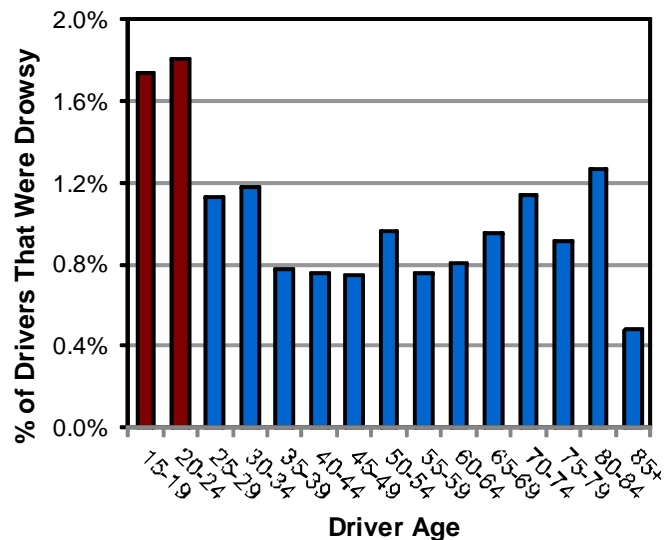
- 1,271 motor vehicle crashes occurred in Utah involving a drowsy driver.
- 187 people have died in Utah over the last ten years in drowsy driver crashes.
- 2% of the motor vehicle crashes in Utah involved a drowsy driver.

Drowsy Driver Deaths by Year (Utah 2007-2016)



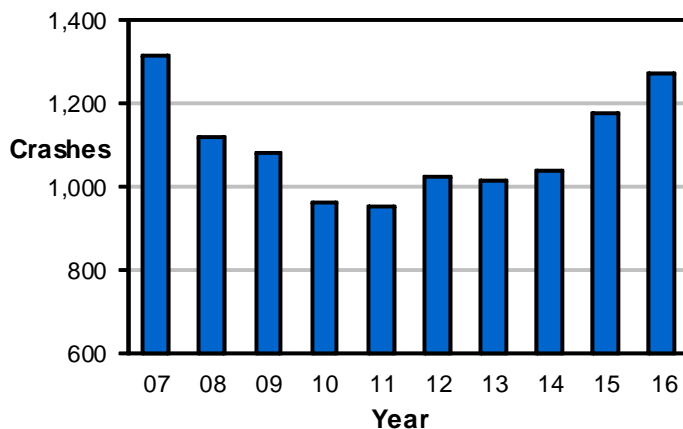
- Over the last ten years, an average of 19 people die each year from drowsy drivers.

Age of Drowsy Drivers in Crashes (Utah 2016)



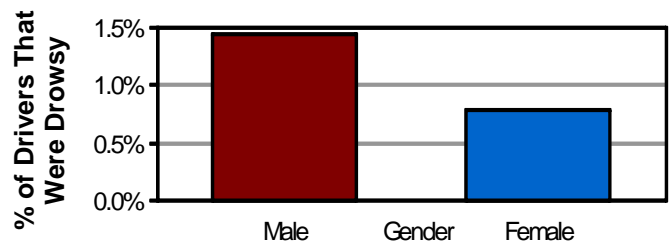
- Drivers aged 15-24 had the highest percent of drivers in crashes that were drowsy.
- Drivers under age 30 years are involved in over half (55%) of drowsy driving crashes.

Drowsy Driver Crashes by Year (Utah 2007-2016)



- Over the last 10 years, an average of 1,096 drowsy driver crashes occur each year.

Gender of Drowsy Drivers in Crashes (Utah 2016)

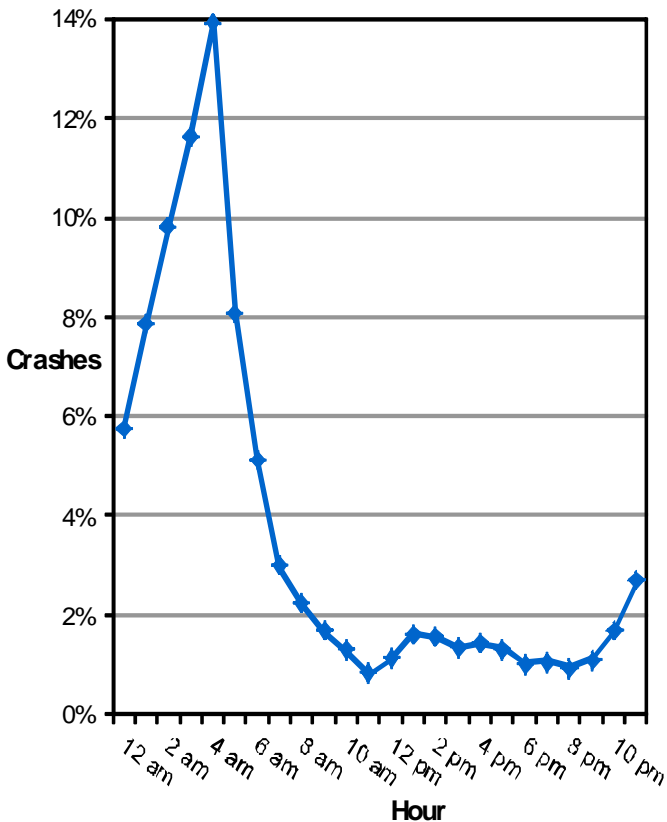


- Males were 1.8 times more likely to be in a drowsy driver crash than females.

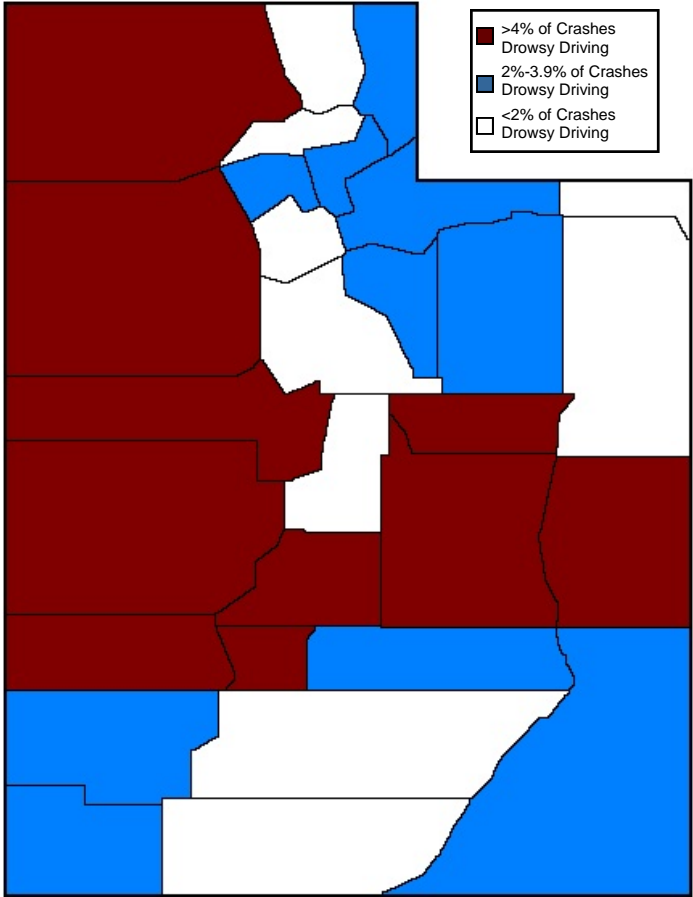
Drowsy Driving



Percent of Total Crashes with a Drowsy Driver by Hour (Utah 2016)

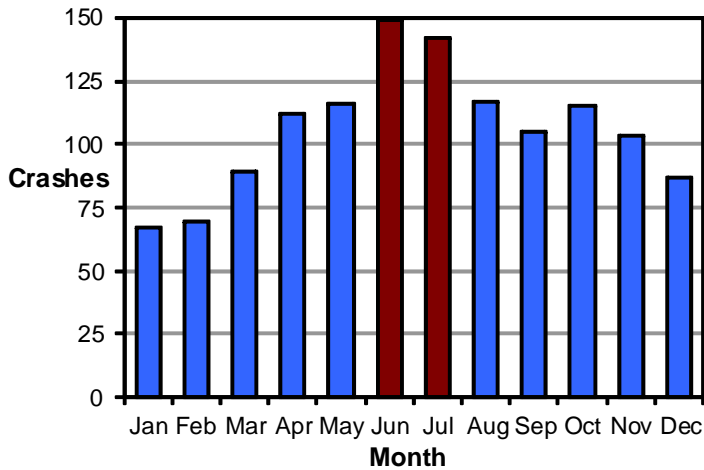


Percent of Total Crashes with a Drowsy Driver by County (Utah 2016)



- While 2% of total crashes involved a drowsy driver, 9% of crashes occurring during the hours of midnight-5:59 a.m. involved a drowsy driver.

Drowsy Driver Crashes by Month (Utah 2016)



- Juab and Emery Counties had the highest percent of crashes involving drowsy drivers.
- Rural crashes were 2.3 times more likely to involve a drowsy driver than urban crashes.

- June and July had the most drowsy driver crashes.

Before driving:

- **Get adequate sleep - most adults need 7-9 hours to maintain proper alertness during the day**
- **Schedule proper breaks - about every 100 miles or 2 hours during long trips**
- **Arrange for a travel companion - someone to talk with and share driving**
- **Avoid alcohol and sedating medications - check your labels or ask your doctor**

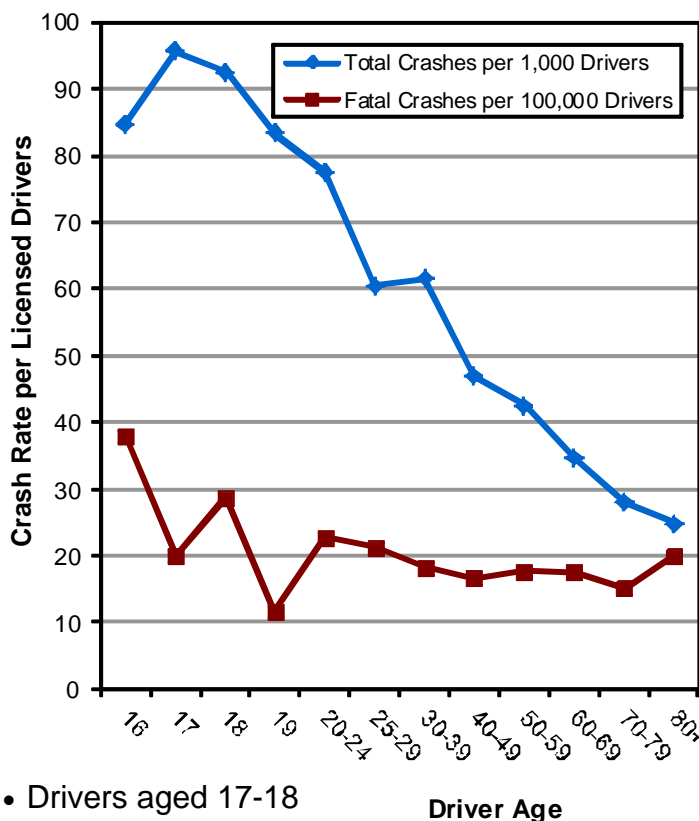
Did you know in 2016:

- Teenage drivers represented 9% of the licensed drivers in Utah, yet they were in 21% of all motor vehicle crashes.
- Teenage drivers were in 13,159 motor vehicle crashes which resulted in 5,900 injured persons and 45 deaths.
- Teenage drivers were 1.7 times more likely to be in a crash than drivers of other ages.
- After having a decreasing trend since 1996, teen driver crashes have increased the last 3 years.

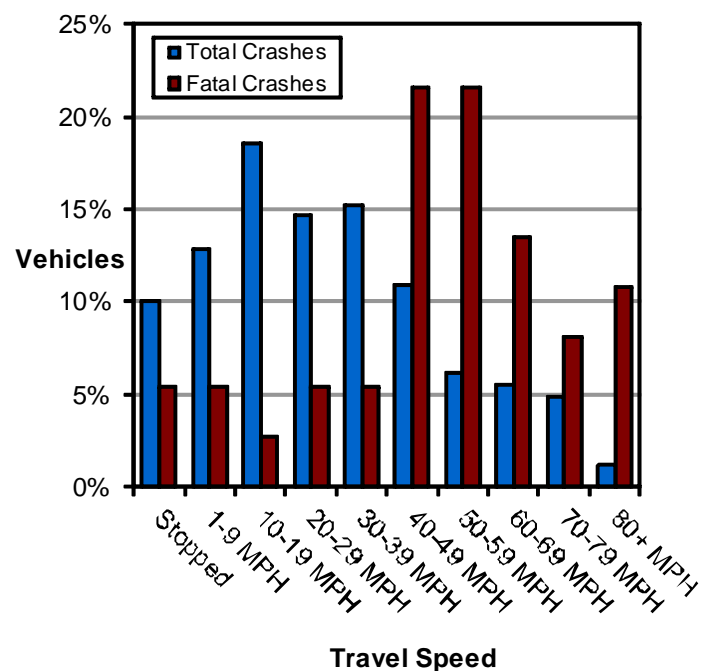
Teenage Drivers (15-19 years)



Crash Rates per Licensed Driver by Age (Utah 2016)



Teenage Driver Crashes by Travel Speed (Utah 2016)



- Crashes involving teenage driver vehicles traveling 50 MPH or higher were 5.5 times more likely to be fatal.

- Drivers aged 17-18 years had the highest total crash rate per licensed driver.

Leading Contributing Factors of Teenage Driver Crashes (Utah 2016) All Teenage Driver Crashes

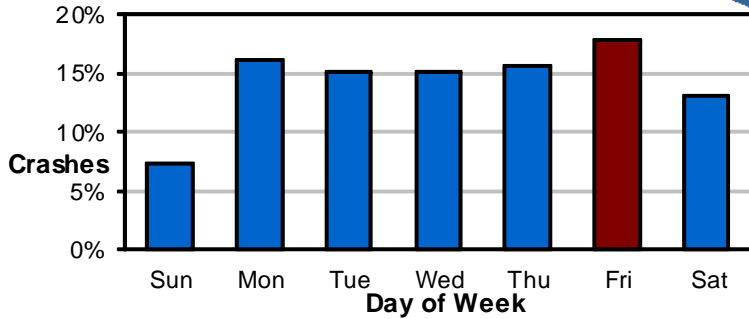
1. Followed Too Closely (21%)
2. Failed to Yield Right of Way (18%)
3. Speed Too Fast (13%)
4. Driver Distraction (9%)
5. Failed to Keep in Proper Lane (8%)



Teenage Drivers (15-19 years)

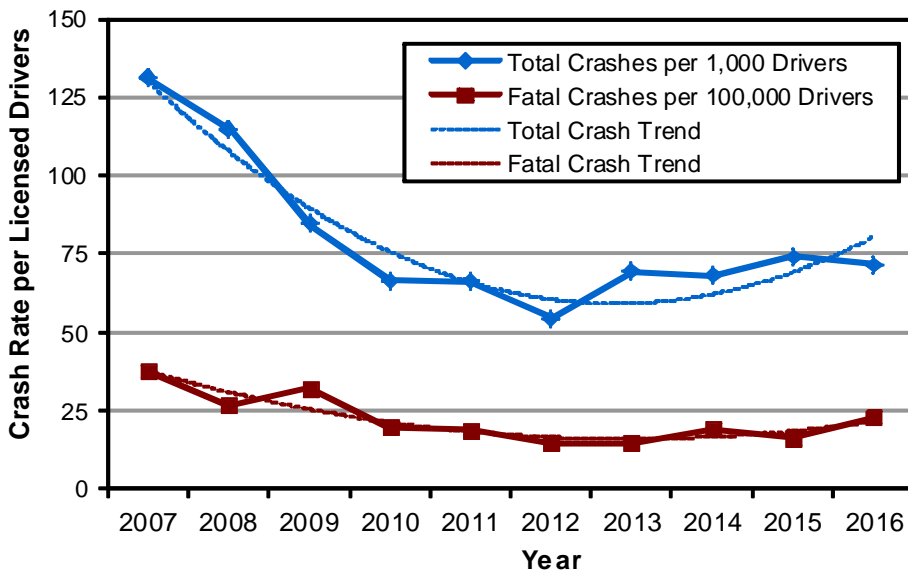


Teenage Driver Crashes by Day of Week (Utah 2016)



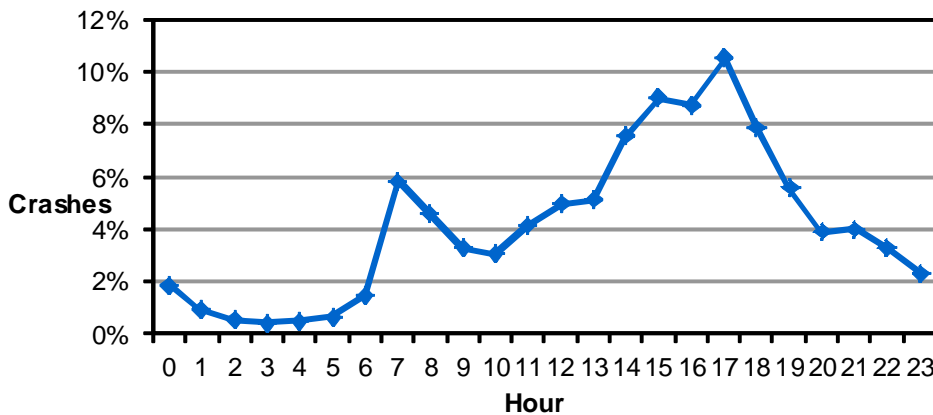
- Teen driver crashes occurred more often on weekdays.

Teenage Driver Crash Trend (Utah 2007-2016)



- The teenage driver crash rate per licensed driver decreased 37% from 2006 to 2015.

Teenage Driver Crashes by Hour (Utah 2016)



- Teenage-driver crashes peaked during after-school hours (2:00 p.m.-6:59 p.m.).

Graduated Driver Licensing (GDL) Law in Utah

GDL allows beginning drivers the chance to build experience before they are exposed to more high-risk situations, such as carrying teen passengers and nighttime driving. Easing young drivers onto the roadways can reduce the number of traffic crashes involving young drivers.

Learner Permit

A person must be at least 15 years old to apply for a learner permit. Anyone who is under 18 years of age is required to hold a learner permit for six months before applying for a license.

Supervised Driving

Everyone under 18 years of age applying for a license must complete 40 hours of driving, of which at least 10 hours must be during night hours. This allows beginning drivers to practice and gain supervised experience.

Driver License

A person must be at least 16 years of age to get a driver license. Everyone who has never been licensed to drive a motor vehicle must complete an approved driver education course.

Night-time Restrictions

Anyone under the age of 17 years may not drive from midnight to 5:00 a.m. except in a limited number of situations. The majority of fatal teen crashes take place at night.

Passenger Restrictions

For the first six months of licensure, teen drivers can not drive with any passenger who is not an immediate family member with a few exceptions. Teen drivers are more likely to crash with passengers in the car, especially teen passengers. The more passengers, the greater the risk.

Seat Belt Restrictions

Utah law requires all motor vehicle occupants to wear a seat belt.

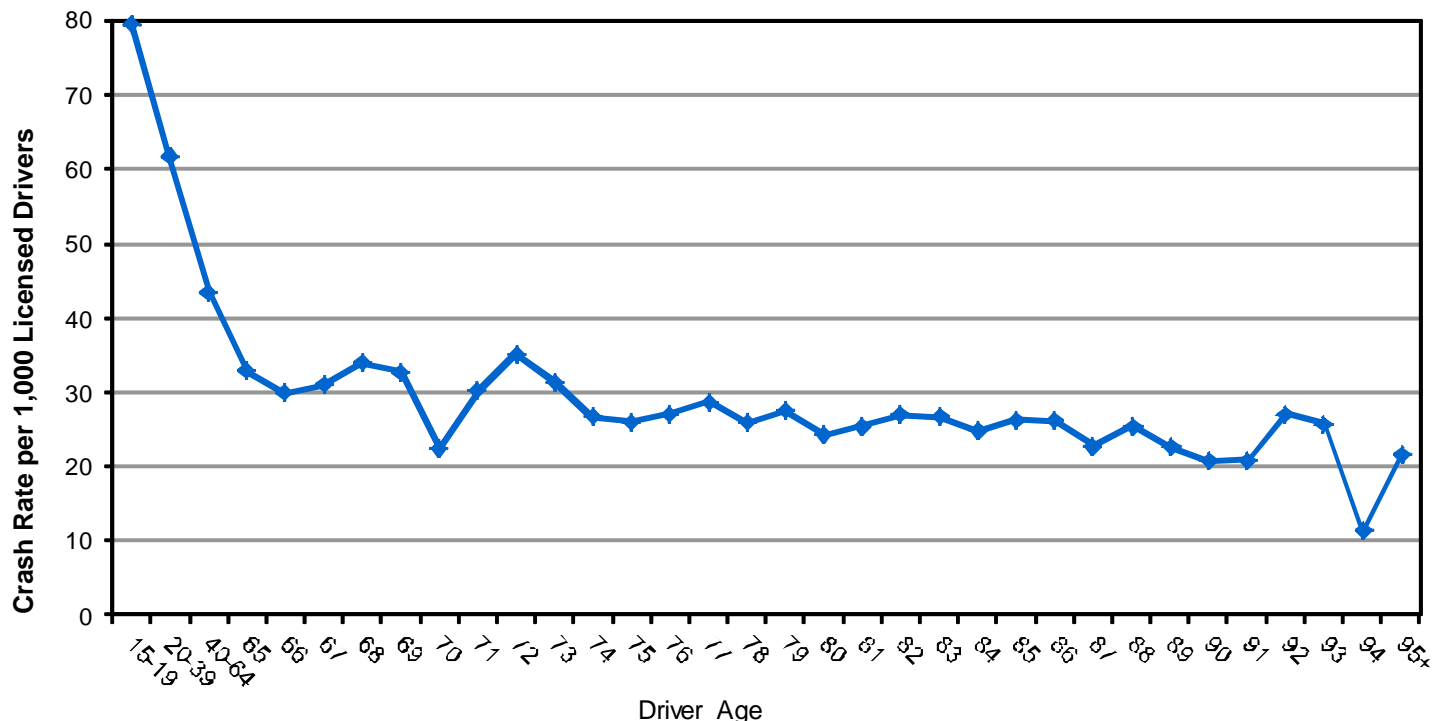
Did you know in 2016:

- Older drivers had the lowest crash rate per licensed driver.
- Older drivers were in 8,180 motor vehicle crashes which resulted in 4,083 injured persons and 50 deaths.
- Although older drivers have the lowest crash rates of any drivers, the percent of crashes involving an older driver has been increasing for over a decade.
- Seniors represented 7% of people in a crash and 18% of the deaths.

Older Drivers (Age 65+)



Crash Rates per Licensed Driver by Age (Utah 2016)



- The older the driver the less likely they were in a crash per licensed driver.

Leading Contributing Factors of Older Driver Crashes Compared to All Drivers (Utah 2016)

All Drivers in Crashes

1. Followed Too Closely (24%)
2. Failed to Yield Right of Way (20%)
3. Speed Too Fast (15%)
4. Failed to Keep in Proper Lane (13%)
5. Driver Distraction (9%)

Older Driver Crashes

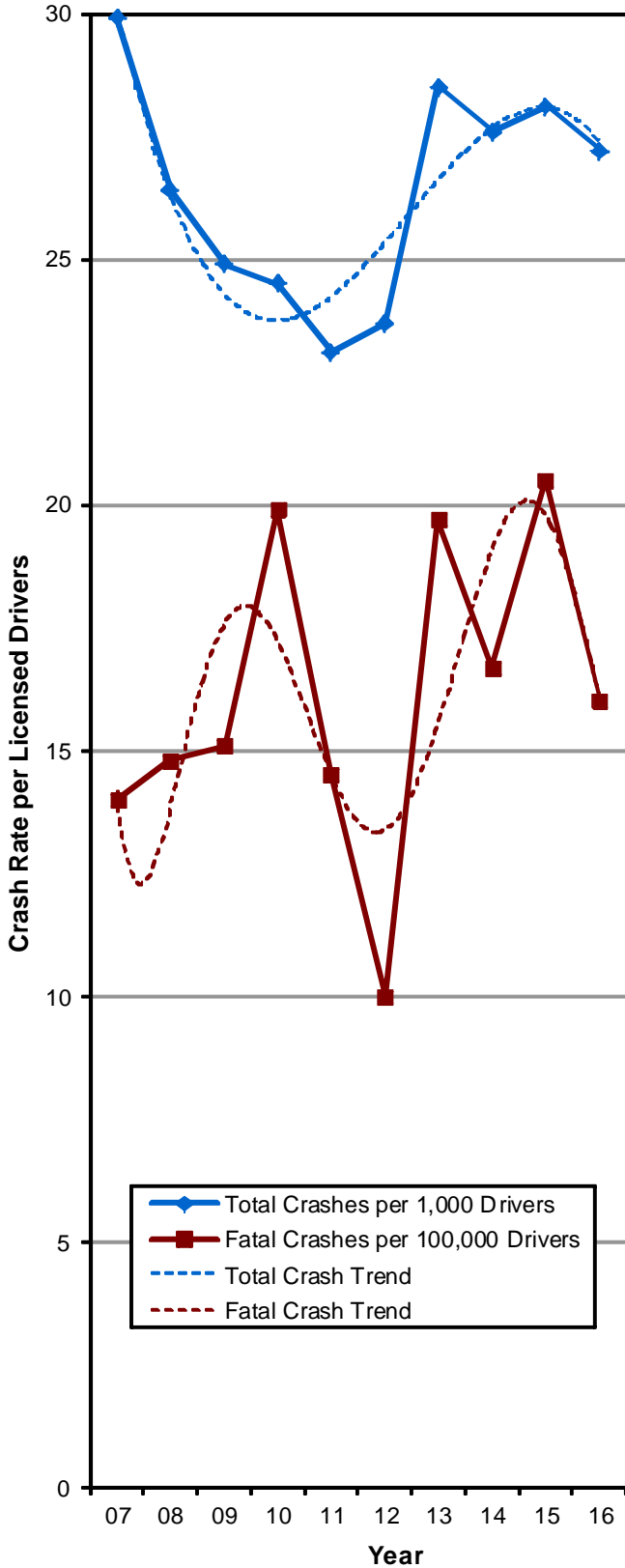
1. Failed to Yield Right of Way (18%)
2. Followed Too Closely (9%)
3. Failed to Keep in Proper Lane (6%)
4. Disregard Traffic Signal/Sign (5%)
5. Improper Turn (5%)

- The contributing factors for older drivers were different than other drivers in a crash.

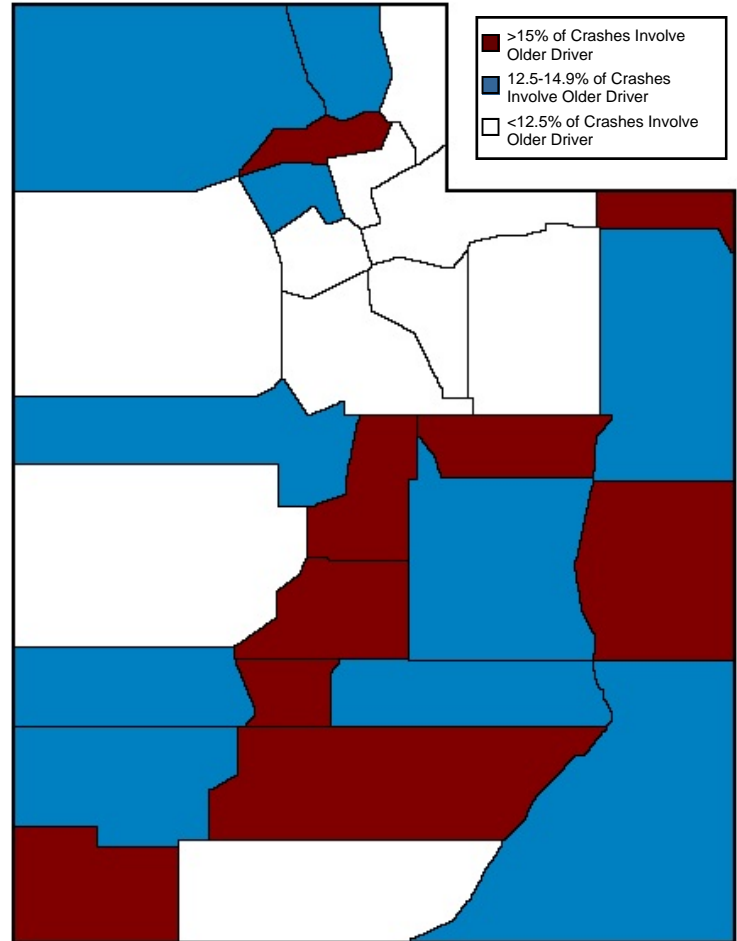
Older Drivers (Age 65+)



**Older Driver Crash Trend
(Utah 2007-2016)**

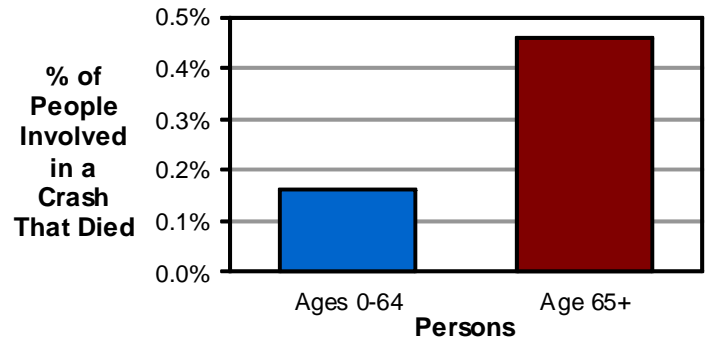


**Older Driver Crashes by County
(Utah 2016)**



- Piute, Washington, Daggett, and Grand counties had the highest percent of crashes that involved an older driver.

Injury Severity by Age (Utah 2016)



- The older driver crash rate per licensed driver has shown an increasing trend the last few years.

- People age 65+ were 2.8 times more likely to be killed in a crash than younger people.

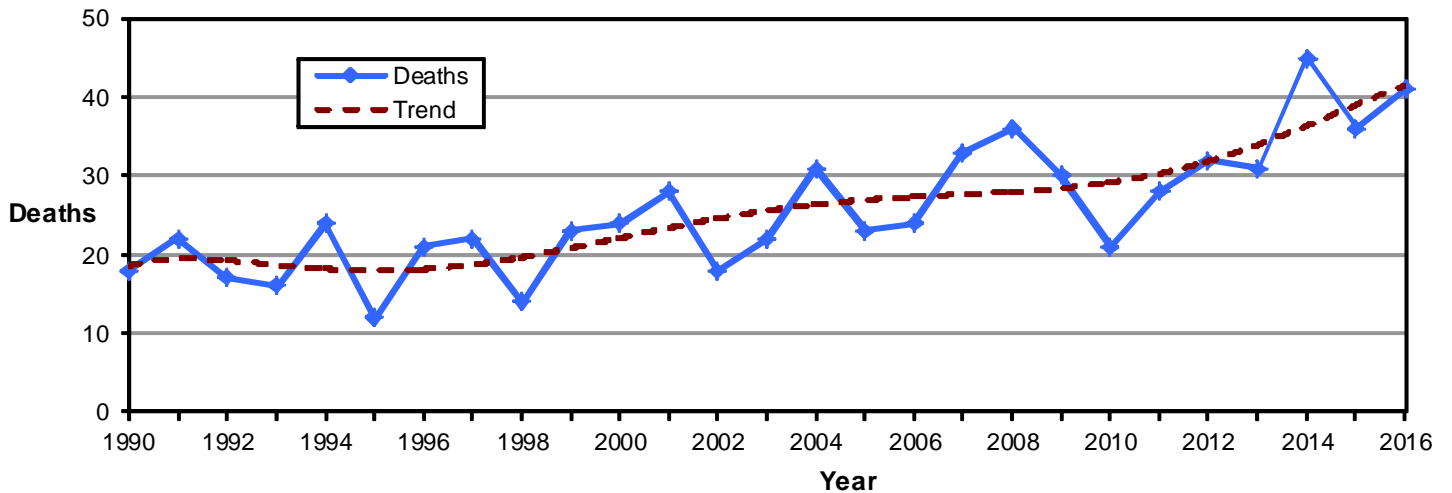
Motorcycles



Did you know in 2016:

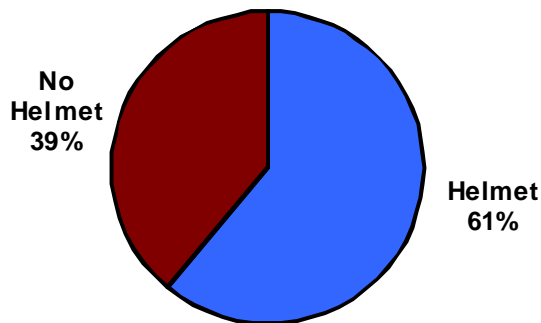
- There were 1,168 motorcycle crashes in Utah, resulting in 1,014 injured motorcyclists and 41 motorcyclist deaths.
- Motorcyclists accounted for 1% of persons in crashes and 15% of deaths.
- Motorcycle crashes were 9.9 times more likely to result in a death than other crashes.

Motorcyclist Deaths (Utah 1990-2016)



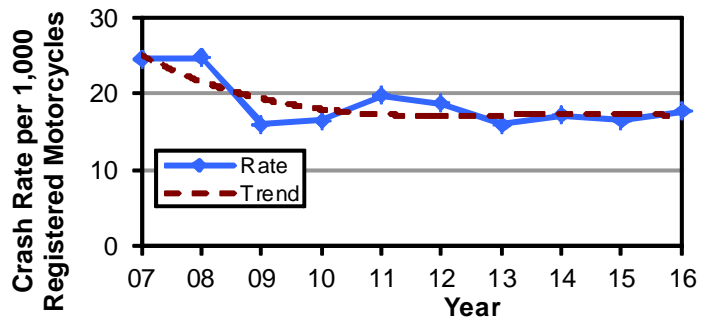
- Motorcyclist deaths have been on the rise since the 1990s.
- The 45 motorcyclist deaths in 2014 were the highest total on record in Utah.

Helmet Use of Motorcyclists in Crashes (Utah 2016)



- Only 61% of motorcyclists wore a helmet.
- Utah law requires anyone under the age of 18 years riding a motorcycle to wear a helmet.

Motorcyclist Crash Rates per Registered Motorcycles (Utah 2007-2016)



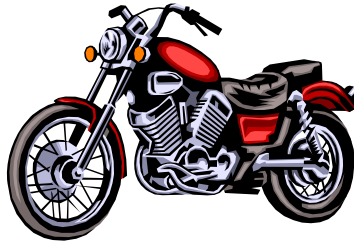
- The rate of motorcyclists in crashes per registered motorcycles decreased 28% from 2007.



Motorcycles

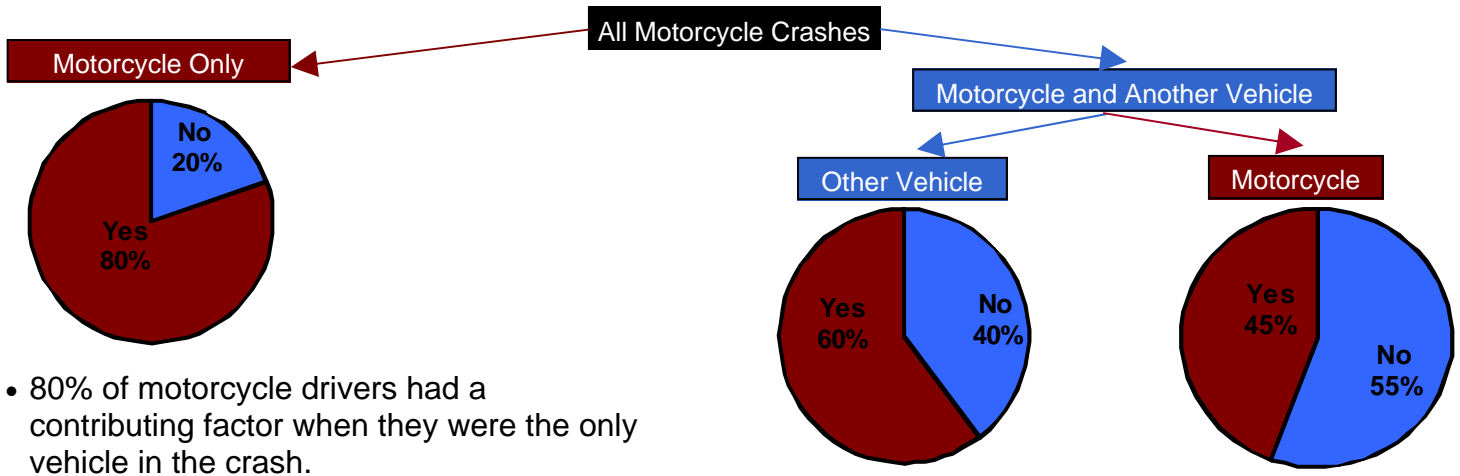
Leading Motorcyclist Contributing Factors in Crashes (Utah 2016)

1. Speed Too Fast (11%)
2. Followed Too Closely (10%)
3. Failed to Keep in Proper Lane (7%)
4. Ran Off Road (6%)
5. Swerved or Evasive Action (5%)



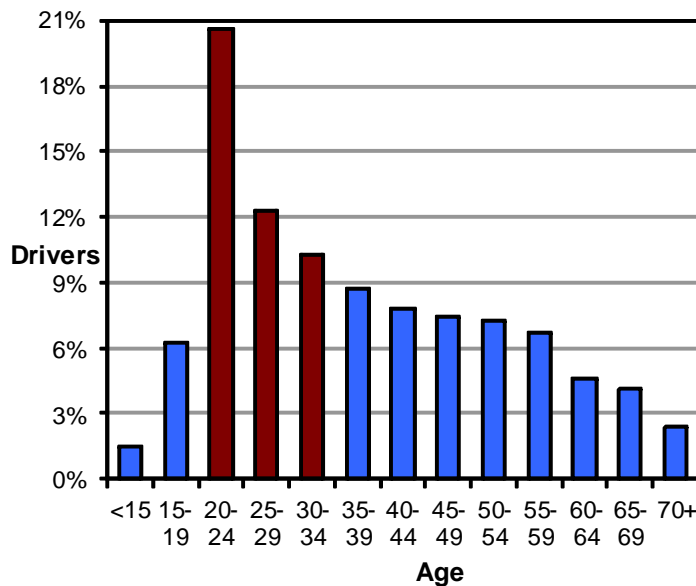
Left Turns
 Nearly one-third (28%) of drivers who hit motorcycles were turning left. Drivers need to watch for motorcycles before turning.

Contributing Factor Summary in Motorcycle Crashes (Utah 2016)



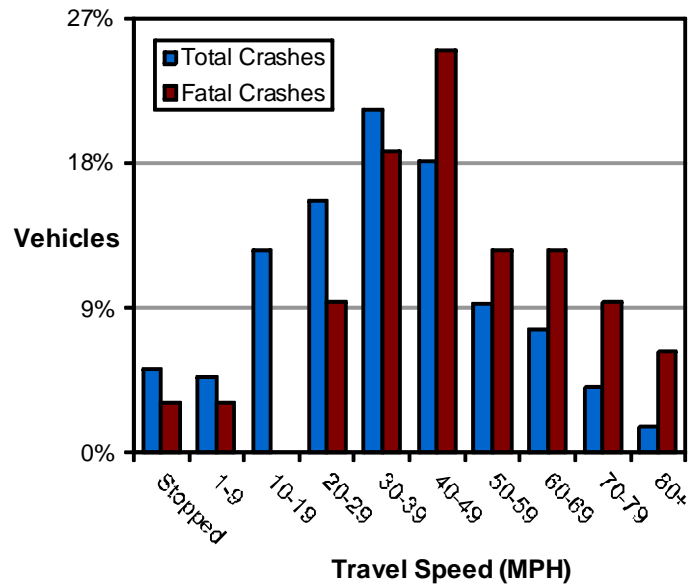
- 80% of motorcycle drivers had a contributing factor when they were the only vehicle in the crash.
- In motorcycle crashes involving more than one vehicle, 45% of motorcycle drivers and 60% of drivers other than motorcyclists had a contributing factor.

Age of Motorcycle Drivers in All Crashes (Utah 2016)



- Over one-half (51%) of motorcycle drivers in crashes were under the age of 35 years.

Travel Speed of Motorcycles in Crashes (Utah 2016)



- 40 MPH or higher is when the travel speed of motorcycles becomes increasingly deadly.

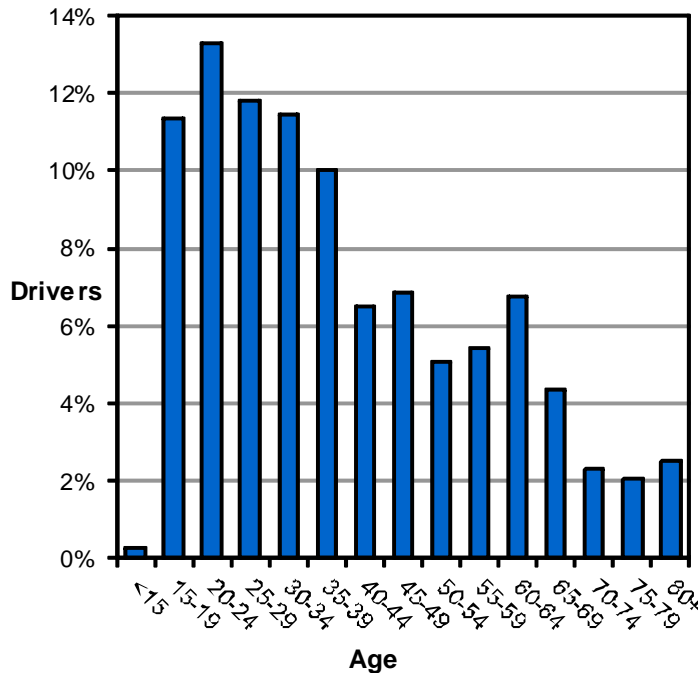
Did you know in 2016:

- 1,006 pedestrians were struck by motor vehicles; 898 were injured and 39 were killed.
- Pedestrians accounted for 1% of persons in crashes and 14% of deaths.
- The 49 pedestrian deaths in 2015 were the highest in Utah since 1987.

Pedestrians

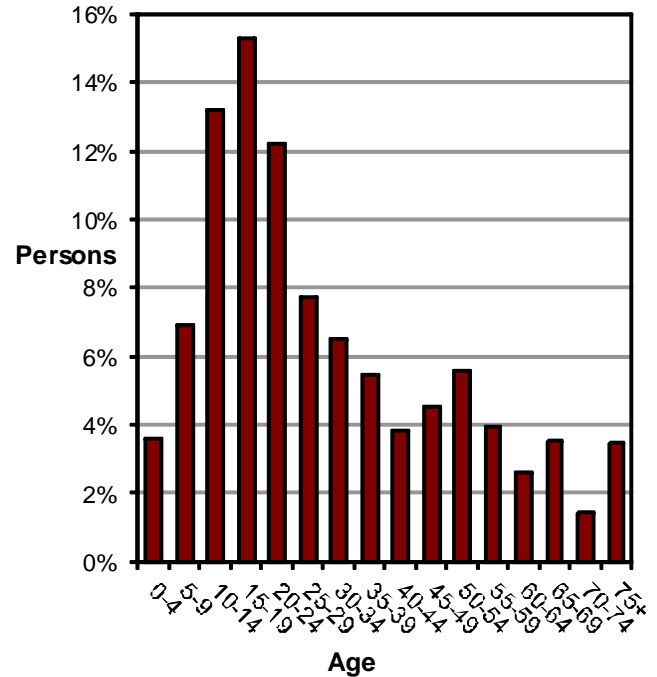


Age of Drivers in Pedestrian-Motor Vehicle Crashes (Utah 2016)



- 58% of drivers in pedestrian-motor vehicle crashes were under 40 years.

Age of Pedestrians in Pedestrian-Motor Vehicle Crashes (Utah 2016)



- 51% of the pedestrians in crashes were under 25 years of age.

Leading Contributing Factors of Drivers in Pedestrian Crashes (Utah 2016)

1. Failed to Yield Right of Way (36%)
2. Hit and Run (11%)
3. Driver Distraction (8%)
4. Improper Backing (4%)
5. Speed Too Fast (4%)



Leading Contributing Factors of Pedestrians in Crashes (Utah 2016)

1. Improper Crossing (12%)
 2. Darting (9%)
 3. Not Visible (6%)
- 55% of pedestrians had no contributing factor in the crash.

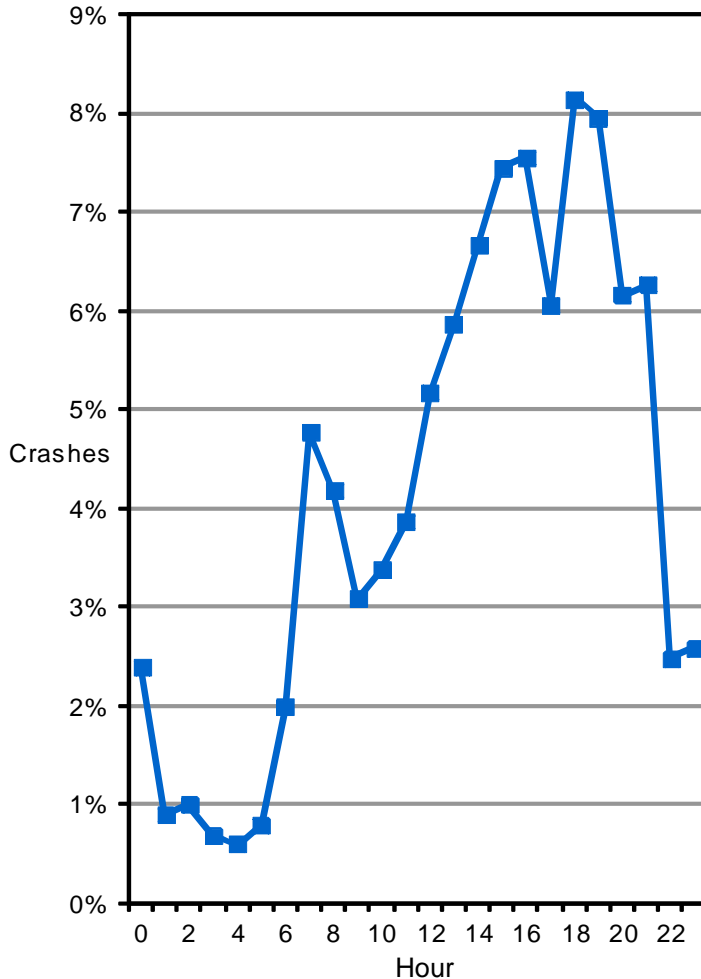


Pedestrians



Nearly one-third (32%) of drivers who hit pedestrians were turning. Drivers need to watch for pedestrians before turning.

Pedestrian-Motor Vehicle Crashes by Hour (Utah 2016)

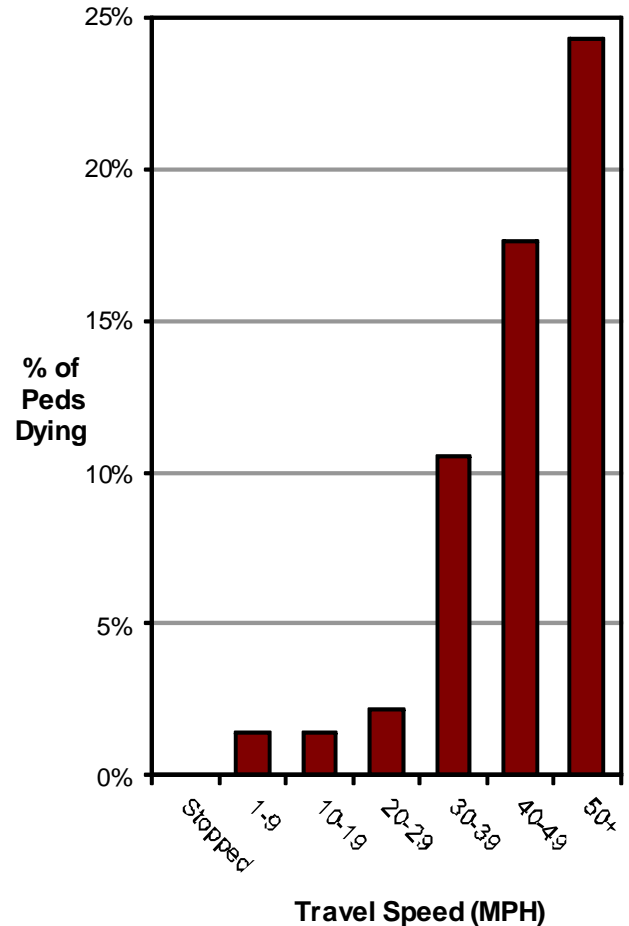


- Pedestrian-motor vehicle crashes occurred most often between 3:00 p.m.-7:59 p.m.

Location of Pedestrians in Crashes (Utah 2016)

1. Marked Crosswalk at Intersection (39%)
2. In Roadway Not at Intersection/Crosswalk (22%)
3. Unmarked Crosswalk (8%)
4. Sidewalk (6%)
5. Mid-Block Crosswalk (5%)

Percent of Pedestrians Dying by Vehicle Travel Speed (Utah 2016)



- The higher the speed of the vehicle the more likely the pedestrian was injured or killed in a crash.
- Pedestrians hit by a vehicle traveling 40 MPH or higher were 9.8 times more likely to die.

Motor Vehicle Action Prior to Crash (Utah 2016)

1. Straight Ahead (49%)
2. Turning Left (16%)
3. Turning Right (15%)
4. Backing (7%)
5. Parking (5%)



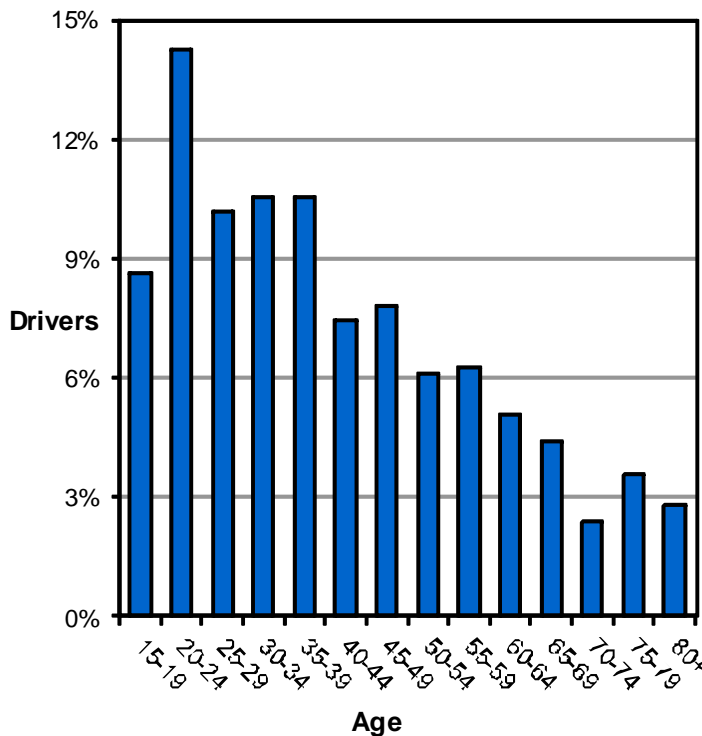
Did you know in 2016:

- 655 bicyclists were hit by motor vehicles; 613 were injured and 5 were killed.
- Utah's bicyclist crash rate per population decreased for the fourth straight year.

Bicyclists

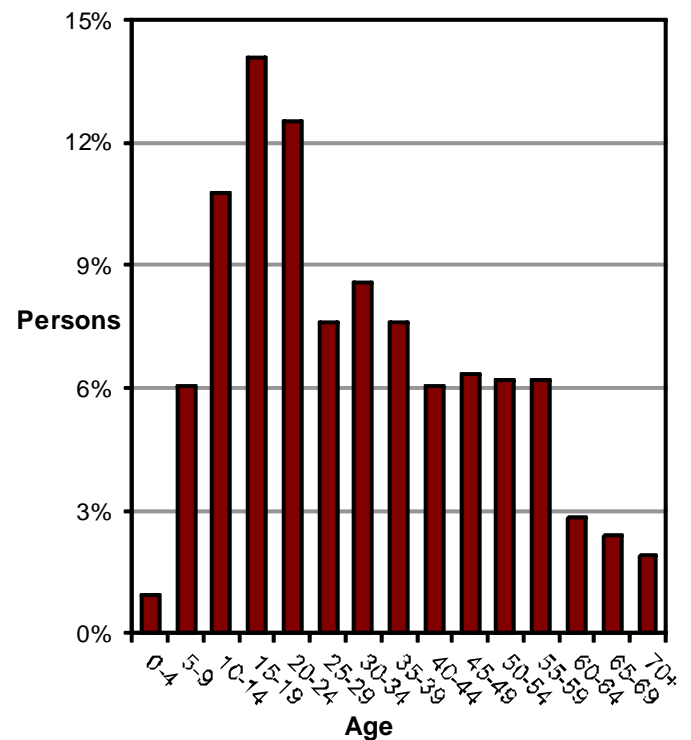


Age of Drivers in Bicycle-Motor Vehicle Crashes (Utah 2016)



- Over one-half (54%) of drivers in bicycle-motor vehicle crashes were under 40 years.

Age of Bicyclists in Bicycle-Motor Vehicle Crashes (Utah 2016)



- Nearly two-thirds (61%) of the bicyclists in crashes were under 35 years of age.

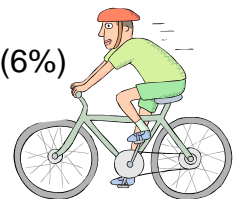
Leading Contributing Factors of Drivers in Bicyclist Crashes (Utah 2016)

1. Fail to Yield Right of Way (42%)
2. Hit and Run (6%)
3. Improper Turn (4%)
4. Driver Distraction (3%)
5. Disregard Traffic Signal/Sign (2%)



Leading Contributing Factors of Bicyclists in Crashes (Utah 2016)

1. Wrong Side of Road (11%)
 2. Improper Crossing (9%)
 3. Disregard Traffic Sign/Signal (6%)
- 48% of bicyclists had no contributing factor in the crash.

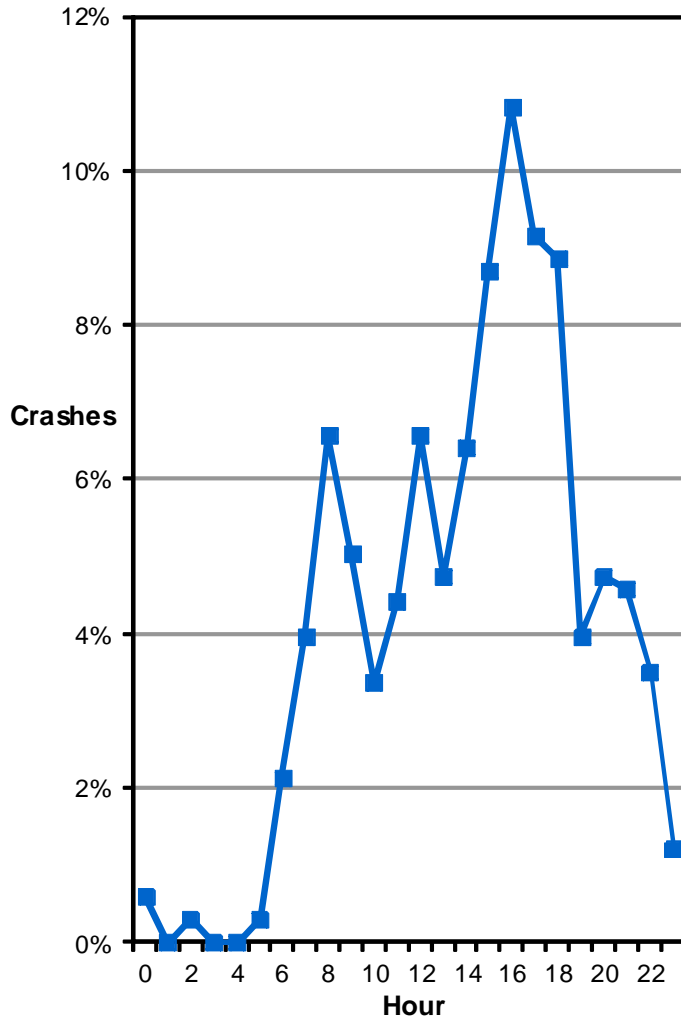


Bicyclists

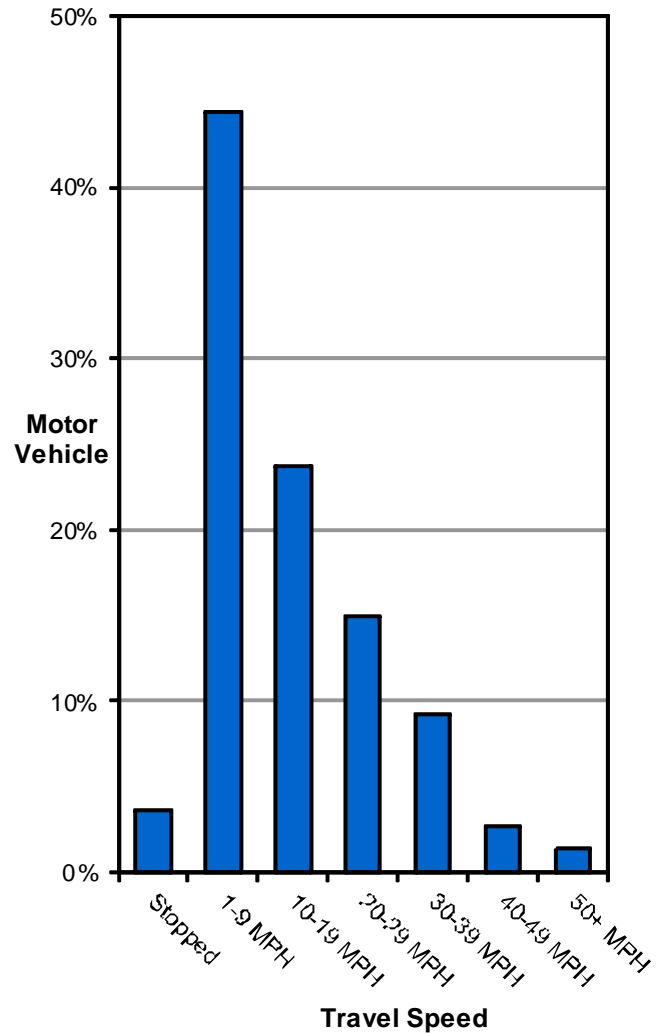


Over one-half (53%) of motor vehicles that hit bicyclists were turning. Drivers need to watch for bicycles before turning.

Bicycle-Motor Vehicle Crashes by Hour (Utah 2016)



Bicycle-Motor Vehicle Crashes by Motor Vehicle Travel Speed (Utah 2016)



- Bicycle-motor vehicle crashes occurred most often between 3:00 p.m.-6:59 p.m.

- 69% of crashes with bicyclists occurred when the motor vehicle was traveling 1-19 MPH.

Bicyclist Action Prior to Crash (Utah 2016)

1. Cycling Along Road with Traffic (29%)
2. Entering or Crossing Road (28%)
3. Cycling on Sidewalk (26%)
4. Cycling Along Road Against Traffic (13%)

Motor Vehicle Action Prior to Crash (Utah 2016)

1. Turning Right (36%)
2. Straight Ahead (36%)
3. Turning Left (16%)
4. Stopped/Slowing (3%)
5. Entering/Leaving Traffic (3%)



Trends



2

Trends



1

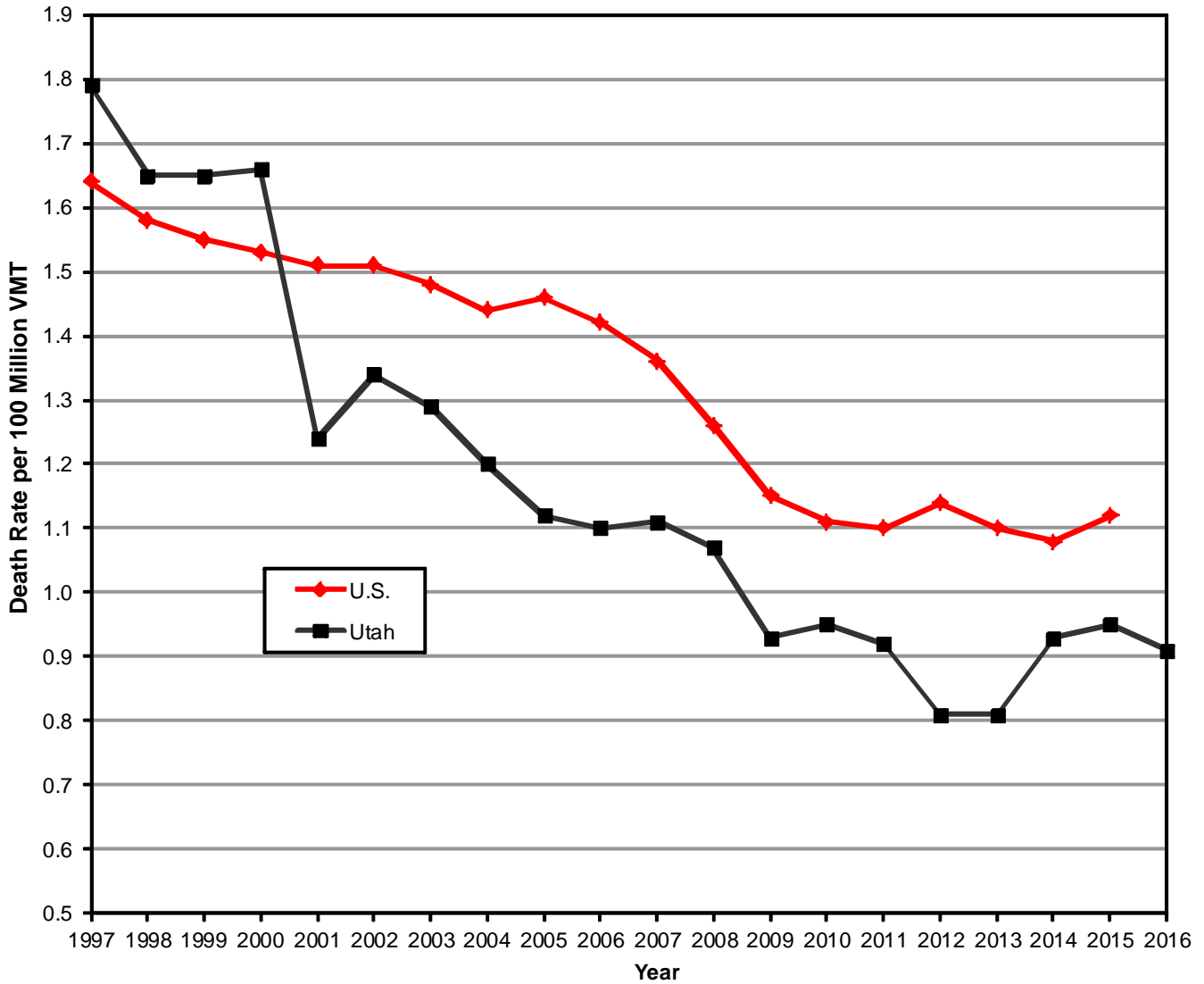
Utah vs. U.S. Death Rate per Miles Traveled.....	2
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6

Deaths

Utah vs. U.S. Death Rate per 100 Million Vehicle Miles Traveled, 1997-2016

Death Rate per Miles Traveled																				
	Year																			
	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
U.S.	1.64	1.58	1.55	1.53	1.51	1.51	1.48	1.44	1.46	1.42	1.36	1.26	1.15	1.11	1.10	1.14	1.10	1.08	1.12	
Utah	1.79	1.65	1.65	1.66	1.24	1.34	1.29	1.20	1.12	1.10	1.11	1.07	0.93	0.95	0.92	0.81	0.81	0.93	0.95	0.91



- In 2015, the Utah death rate per 100 million vehicle miles traveled was 0.95 which was lower than the U.S. rate of 1.12.
- The Utah death rate per 100 million vehicle miles traveled has been lower than the U.S. rate since 2001. This somewhat dispels the notion that drivers in Utah are worse than other drivers in the U.S.

U.S. SOURCE: National Highway Traffic Safety Administration

Crashes

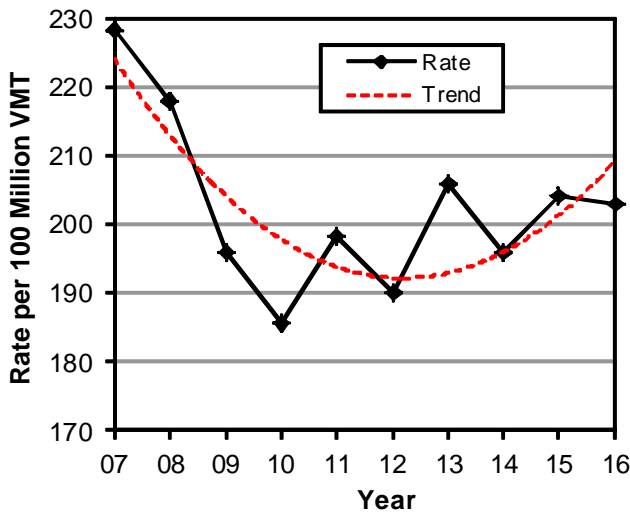
Crashes (Utah 2007-2016)

Crashes								
Year	Property Damage Only		Injury		Fatal		Total	
	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT
2007	42,368	157.9	18,619	69.4	258	0.96	61,245	228.3
2008	38,997	150.7	17,125	66.2	245	0.95	56,367	217.8
2009	35,398	135.0	15,752	60.1	217	0.83	51,367	195.9
2010	34,155	128.3	14,995	56.3	218	0.82	49,368	185.5
2011	36,418	138.1	15,645	59.3	224	0.85	52,287	198.2
2012	34,635	130.0	15,765	59.2	200	0.75	50,600	190.0
2013	39,301	145.5	16,134	59.7	202	0.75	55,637	206.0
2014	37,388	135.6	16,426	59.6	222	0.81	54,036	196.0
2015	42,089	143.2	17,665	60.1	258	0.88	60,012	204.2
2016	43,465	141.2	18,747	60.9	259	0.84	62,471	203.0
Total	384,214	140.6	166,873	61.1	2,303	0.84	553,390	202.5

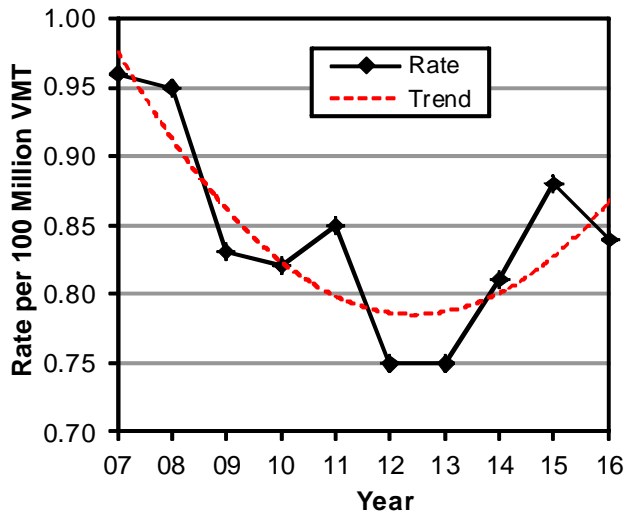
NOTE: A crash may result in multiple injuries and/or deaths. See next page for persons.

- During the last 10 years, 553,390 motor vehicle crashes occurred in Utah. On average, there are 55,300 crashes a year of which 16,700 involve injuries and 230 involve deaths.
- In 2016, total crashes increased 4.1% from 2015.
- The highest total crash rate per 100 million VMT in Utah occurred in 2007 while the lowest year was 2010.

Crash Rates Per 100 Million Vehicle Miles Traveled (Utah 2007-2016)



Fatal Crash Rates Per 100 Million Vehicle Miles Traveled (Utah 2007-2016)



- The 2010 total crash rate was the lowest on record (see Appendix for records back to 1947).
- There was a 11.1% decrease in the total crash rate from 2007-2016.
- The 2012 and 2013 fatal crash rates were the lowest on record.
- There was a 12.5% decrease in the fatal crash rate from 2007-2016.

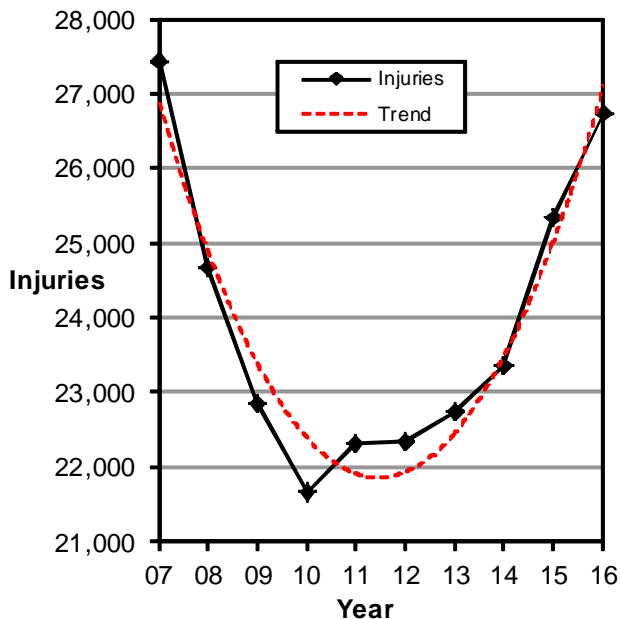
Persons

Persons Involved (Utah 2007-2016)

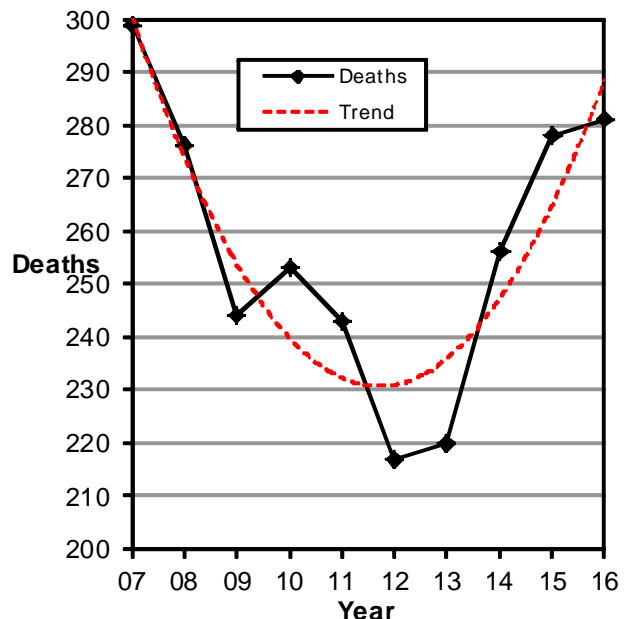
Persons								
Year	Non-Injured		Injured		Killed		Total	
	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT
2007	127,330	474.7	27,420	102.2	299	1.11	155,049	578.0
2008	113,744	439.4	24,673	95.3	276	1.07	138,693	535.8
2009	103,956	396.5	22,847	87.1	244	0.93	127,047	484.6
2010	101,966	383.1	21,675	81.4	253	0.95	123,894	465.5
2011	106,526	403.8	22,325	84.6	243	0.92	129,094	489.4
2012	103,156	387.3	22,336	83.9	217	0.81	125,709	471.9
2013	112,004	414.6	22,740	84.2	220	0.81	134,964	499.6
2014	110,562	401.0	23,364	84.7	256	0.93	134,182	486.6
2015	125,609	427.3	25,350	86.2	278	0.95	151,237	514.5
2016	131,398	426.9	26,738	86.9	281	0.91	158,417	514.7
Total	1,136,251	415.7	239,468	87.6	2,567	0.94	1,378,286	504.3

- During the last 10 years, nearly 1.4 million people have been in a crash. On average over the past 10 years, approximately 24,000 people are injured and 257 people are killed in motor vehicle crashes a year.
- The injury rate per vehicle miles traveled decreased 15.0% from 2007-2016.
- The death rate per vehicle miles traveled in 2012 and 2013 was the lowest in Utah on record.
- Deaths have increased four straight years, with 64 more deaths in Utah in 2016 compared to 2012.

Injured Persons by Year (Utah 2007-2016)



Deaths by Year (Utah 2007-2016)



- The number of people injured in a crash increased for the 6th straight year.
- Deaths in 2016 were the highest total in Utah since 2007.

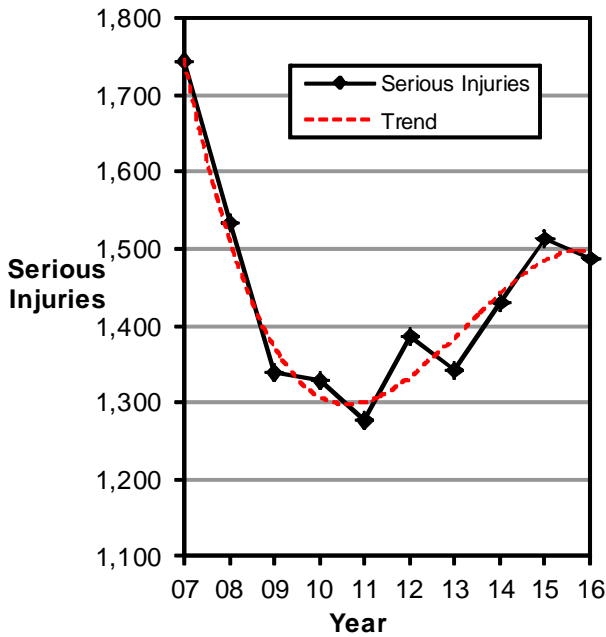
Serious Injuries

Serious Injuries (Utah 2007-2016)

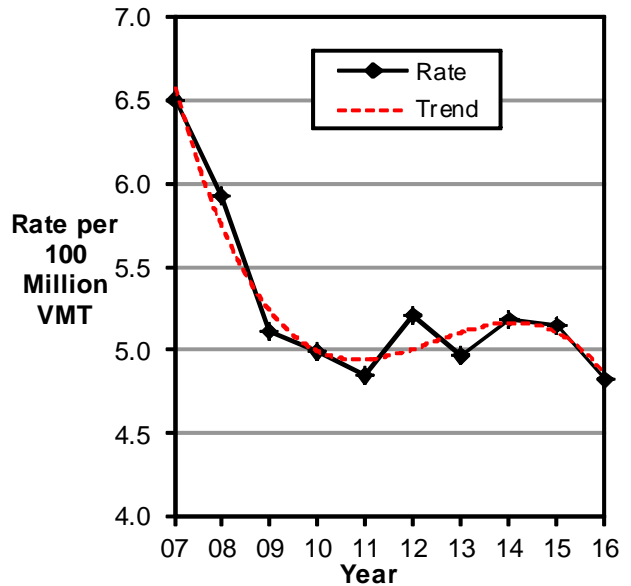
Year	Persons					
	Serious Injuries		Deaths		Total	
	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT
2007	1,743	6.50	299	1.11	2,042	7.61
2008	1,533	5.92	276	1.07	1,809	6.99
2009	1,340	5.11	244	0.93	1,584	6.04
2010	1,329	4.99	253	0.95	1,582	5.94
2011	1,278	4.84	243	0.92	1,521	5.77
2012	1,386	5.20	217	0.81	1,603	6.02
2013	1,343	4.97	220	0.81	1,563	5.79
2014	1,431	5.19	256	0.93	1,687	6.12
2015	1,512	5.14	278	0.95	1,790	6.09
2016	1,488	4.83	281	0.91	1,769	5.75
Total	14,383	5.26	2,567	0.94	16,950	6.20

- During the last 10 years, 14,383 people have suffered a serious injury in a motor vehicle crash. On average over the past 10 years, approximately 1,400 people are seriously injured and 257 people are killed in motor vehicle crashes a year.
- The serious injury rate per vehicle miles traveled decreased 26% from 2007-2016.
- 2007 had the highest serious injury rate per vehicle miles traveled while 2016 had the lowest.

Serious Injuries by Year (Utah 2007-2016)



Serious Injury Rates Per 100 Million Vehicle Miles Traveled (Utah 2007-2016)

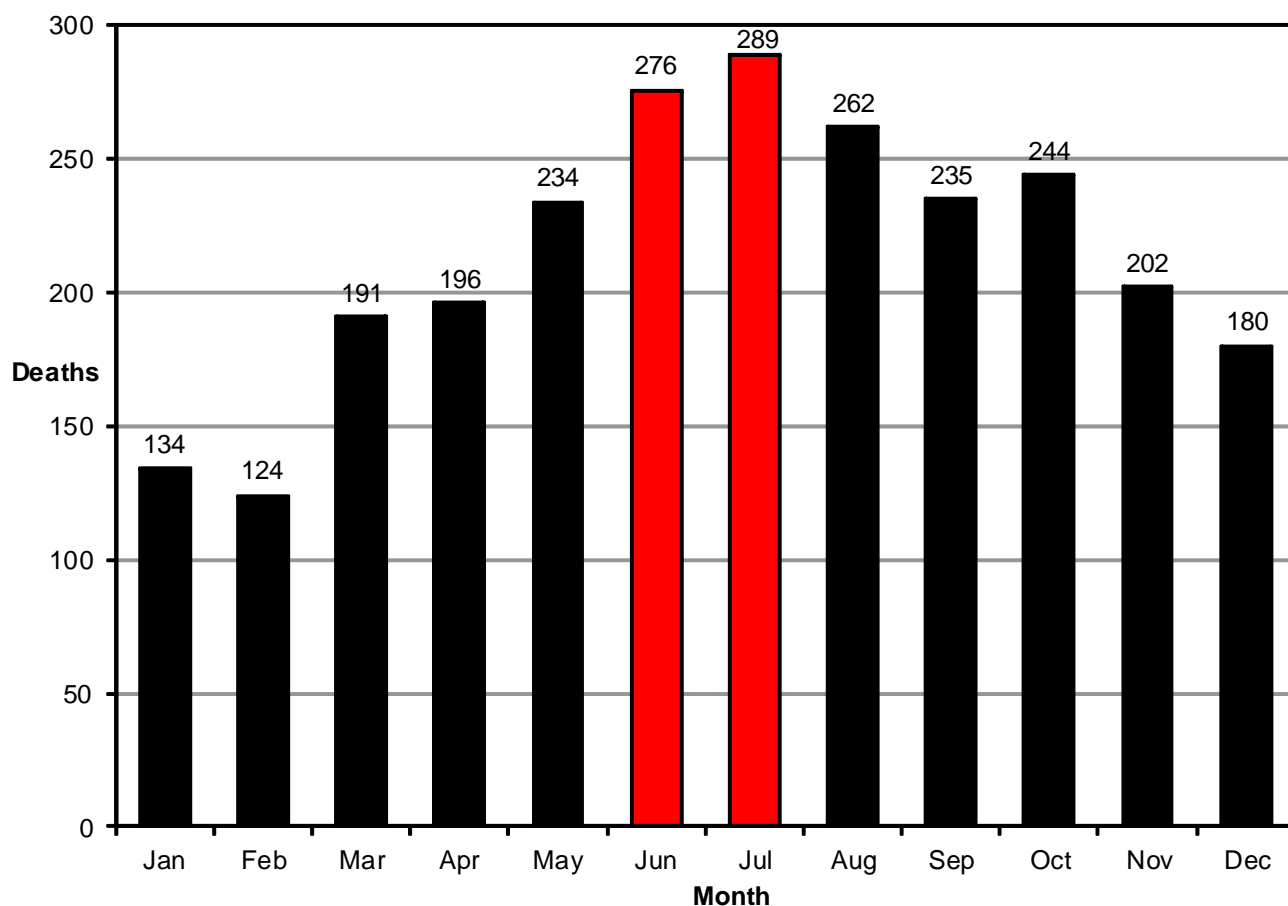


- The number of people seriously injured in a crash decreased after two years of increases.
- The serious injury rate per mile traveled has been fairly level the past eight years.

Deaths

Deaths by Month (Utah 2007-2016)

Month	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
January	16	23	15	8	16	7	4	17	14	14	134	5.2%
February	13	9	17	9	9	15	13	6	15	18	124	4.8%
March	24	12	27	20	21	20	13	15	24	15	191	7.4%
April	35	12	24	22	14	14	19	17	16	23	196	7.6%
May	24	31	21	23	12	23	15	24	29	32	234	9.1%
June	31	30	20	24	28	16	23	38	31	35	276	10.8%
July	35	29	25	28	22	25	30	34	30	31	289	11.3%
August	26	32	32	24	30	22	27	18	34	17	262	10.2%
September	30	23	19	24	30	17	19	26	17	30	235	9.2%
October	26	28	18	28	21	20	22	29	24	28	244	9.5%
November	21	25	13	18	17	23	23	15	20	27	202	7.9%
December	18	22	13	25	23	15	12	17	24	11	180	7.0%
Total	299	276	244	253	243	217	220	256	278	281	2,567	100.0%

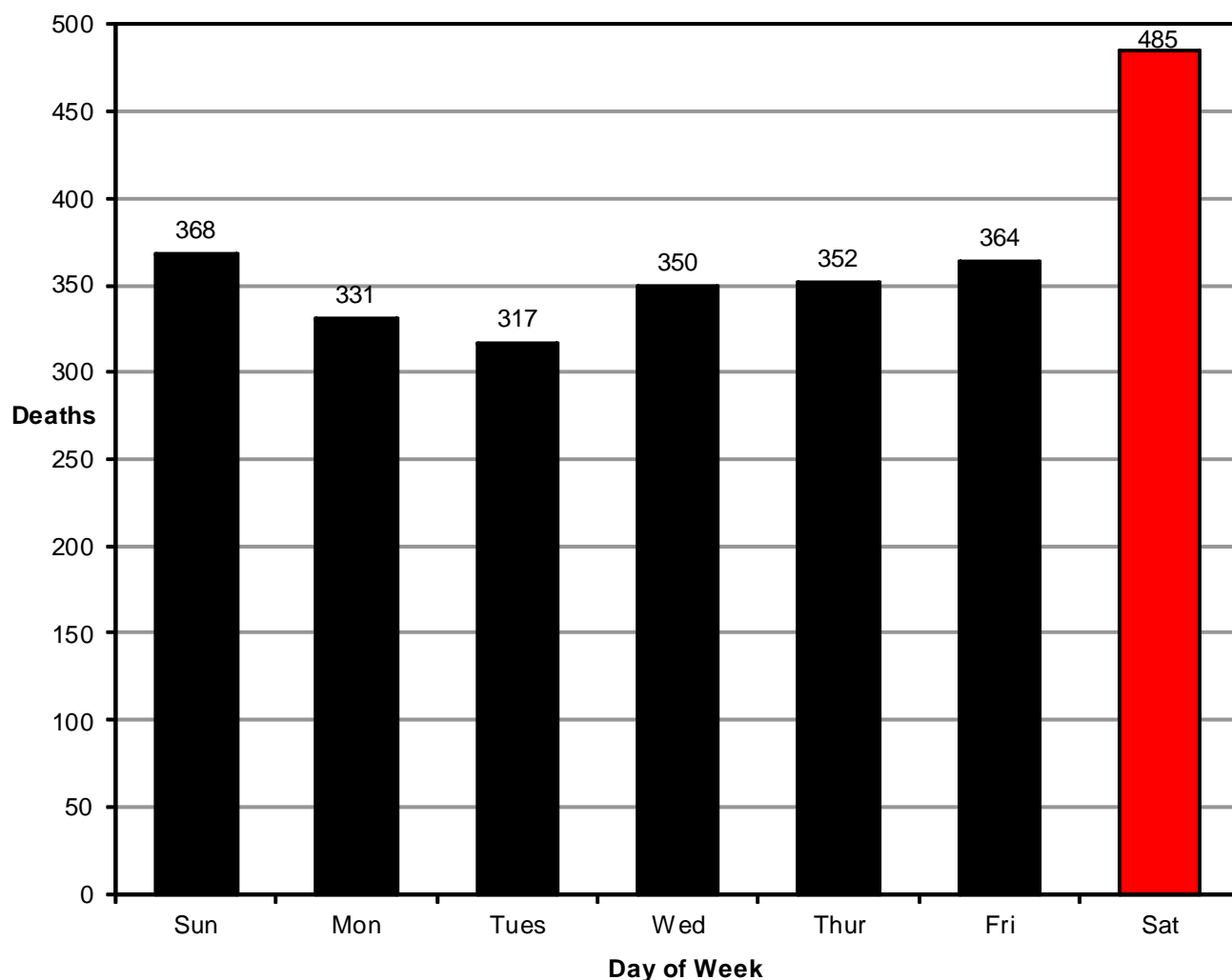


- In the last 10 years, July (289) and June (276) had the highest total number of motor vehicle crash deaths while February (124) and January (134) had the fewest.
- In the last 10 years, June 2014 had the highest number of deaths (38) while January 2013 had the fewest (4).
- In 2016, June (35) and May (32) had the highest number of deaths while December (11) had the fewest.

Deaths

Deaths by Day of Week (Utah 2007-2016)

Day of Week	Deaths										Total	
	Year										#	%
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016		
Sunday	55	47	35	30	27	41	29	29	40	35	368	14.3%
Monday	39	30	33	36	25	30	37	37	26	38	331	12.9%
Tuesday	39	43	39	31	32	24	20	24	33	32	317	12.3%
Wednesday	39	31	40	23	32	34	24	35	45	47	350	13.6%
Thursday	37	31	27	50	33	21	38	34	43	38	352	13.7%
Friday	30	42	32	26	40	29	36	40	46	43	364	14.2%
Saturday	60	52	38	57	54	38	36	57	45	48	485	18.9%
Total	299	276	244	253	243	217	220	256	278	281	2,567	100.0%

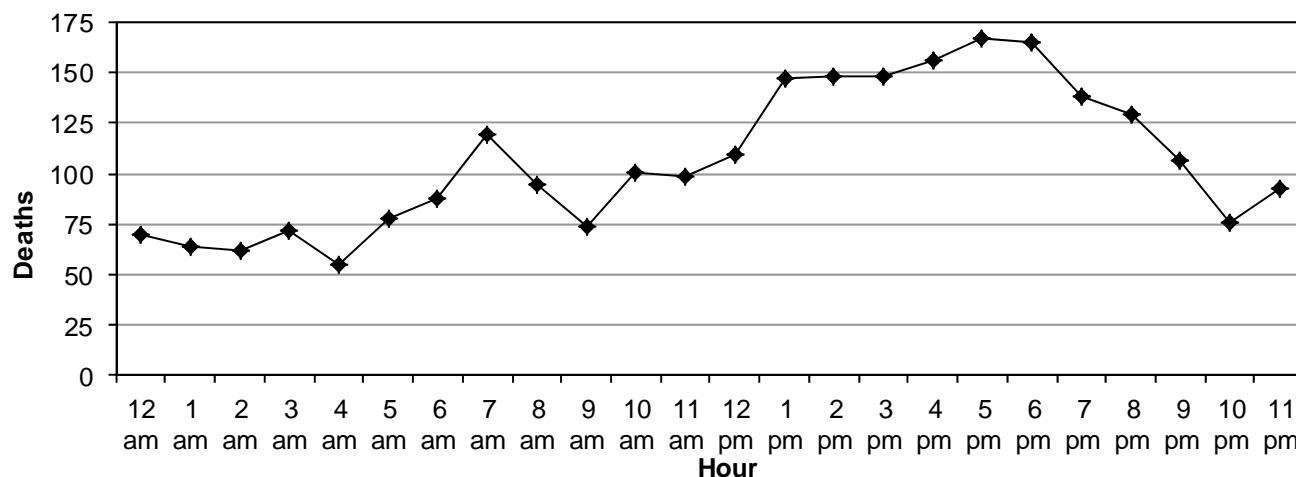


- In the last 10 years, Saturday (485) had the highest total number of motor vehicle crash deaths while Tuesday (317) had the fewest.
- In the last 10 years, Saturdays in 2007 had the highest number of deaths (60) while Tuesdays in 2013 had the fewest (20).
- In 2016, Saturday (48) had the highest number of deaths while Tuesday (32) had the fewest.

Deaths

Deaths by Hour (Utah 2007-2016)

Hour	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
Midnight	12	5	16	5	4	6	5	3	8	6	70	2.7%
1 a.m.	9	12	5	4	6	5	4	8	5	6	64	2.5%
2 a.m.	11	7	4	8	7	7	3	3	5	7	62	2.4%
3 a.m.	18	3	3	5	10	6	1	6	7	13	72	2.8%
4 a.m.	3	5	12	3	5	3	5	10	6	3	55	2.1%
5 a.m.	9	8	5	8	10	5	8	4	12	9	78	3.0%
6 a.m.	9	10	8	11	6	7	7	16	10	4	88	3.4%
7 a.m.	12	20	13	17	8	8	9	7	15	10	119	4.6%
8 a.m.	15	8	7	11	7	5	10	15	8	9	95	3.7%
9 a.m.	7	11	6	11	9	3	8	5	9	5	74	2.9%
10 a.m.	7	8	13	9	13	10	9	8	13	11	101	3.9%
11 a.m.	10	16	14	12	6	6	7	9	8	11	99	3.9%
Noon	12	14	7	13	10	8	14	12	6	14	110	4.3%
1 p.m.	15	8	13	14	17	8	19	19	5	29	147	5.7%
2 p.m.	15	9	7	20	14	19	9	14	23	18	148	5.8%
3 p.m.	21	13	22	13	12	10	14	15	13	15	148	5.8%
4 p.m.	14	14	13	12	13	24	14	15	19	18	156	6.1%
5 p.m.	24	18	19	12	13	20	15	15	17	14	167	6.5%
6 p.m.	15	19	10	16	20	11	12	18	29	15	165	6.4%
7 p.m.	16	21	11	15	12	8	12	10	11	22	138	5.4%
8 p.m.	14	16	14	10	14	15	14	10	11	11	129	5.0%
9 p.m.	5	20	13	9	11	6	9	9	14	11	107	4.2%
10 p.m.	10	4	7	4	7	11	5	12	9	7	76	3.0%
11 p.m.	15	6	1	10	9	6	7	11	15	13	93	3.6%
Total	298	275	243	252	243	217	220	254	278	281	2,561	100.0%



- In the last 10 years, 5 p.m. (167) and 6 p.m. (165) had the highest total number of motor vehicle crash deaths while 4 a.m. (55) and 2 a.m. (62) had the fewest.
- In the last 10 years, 1 p.m. in 2016 and 6 p.m. in 2015 had the highest number of deaths (29) while 11 p.m. in 2009 and 3 a.m. in 2013 had the fewest (1).
- In 2016, 1 p.m. (29) had the highest number of deaths while 4 a.m. (3) had the fewest.

Overview

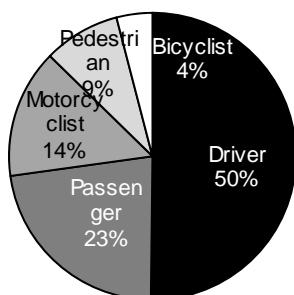
Deaths by Hour and Day of Week (Utah 2007-2016)

Deaths, 2007-2016								
Hour	Day of Week							Total #
	Sun	Mon	Tue	Wed	Thu	Fri	Sat	
Midnight	13	6	2	10	14	9	16	70
1 a.m.	18	3	5	8	2	11	17	64
2 a.m.	18	5	6	8	4	4	17	62
3 a.m.	14	17	4	5	6	8	18	72
4 a.m.	13	4	7	4	6	7	14	55
5 a.m.	14	7	9	6	6	19	17	78
6 a.m.	7	9	14	20	14	12	12	88
7 a.m.	15	16	17	17	22	17	15	119
8 a.m.	13	15	14	11	19	6	17	95
9 a.m.	5	19	11	5	11	9	14	74
10 a.m.	19	11	10	12	11	24	14	101
11 a.m.	11	17	9	12	13	17	20	99
Noon	13	11	16	26	14	13	17	110
1 p.m.	15	26	14	26	23	19	24	147
2 p.m.	31	12	16	25	22	13	29	148
3 p.m.	20	20	22	13	26	19	28	148
4 p.m.	22	20	21	18	19	23	33	156
5 p.m.	30	27	21	22	16	19	32	167
6 p.m.	10	26	20	21	25	30	33	165
7 p.m.	25	13	18	23	27	17	15	138
8 p.m.	20	14	27	14	8	27	19	129
9 p.m.	6	11	12	19	21	17	21	107
10 p.m.	5	10	10	12	9	9	21	76
11 p.m.	11	11	12	13	12	15	19	93
Total	368	330	317	350	350	364	482	2,561

- In the last 10 years, everyday 3 p.m. to 6:59 p.m. and Saturday from 8 p.m. to 11:59 p.m. had high numbers of motor vehicle crash deaths.
- In the last 10 years, weekdays 12 a.m. to 4:59 a.m. had low number of motor vehicle crash deaths.

Serious Injuries by Person Type (Utah 2007-2016)

Person Type	Year											Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%	
Driver	890	749	670	622	626	676	696	695	808	784	7,216	50.2%	
Passenger	454	371	325	320	261	307	244	317	335	322	3,256	22.6%	
Motorcyclist	214	229	195	203	197	196	224	230	203	197	2,088	14.5%	
Pedestrian	132	137	103	123	127	122	115	134	118	131	1,242	8.6%	
Bicyclist	53	47	47	61	67	85	64	55	48	54	581	4.0%	
Total	1,743	1,533	1,340	1,329	1,278	1,386	1,343	1,431	1,512	1,488	14,383	100.0%	

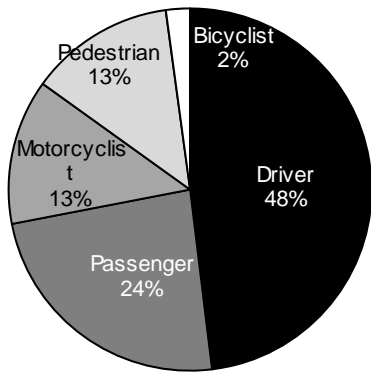


- During the last 10 years, 14,383 people had a serious injury in a crash; 50.2% were drivers, 22.6% were passengers, 14.5% were motorcyclists, 8.6% were pedestrians, and 4.0% were bicyclists.

Deaths

Traffic Deaths by Person Type (Utah 2007-2016)

Person Type	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
Driver	139	133	119	129	123	106	106	115	136	128	1,234	48.1%
Passenger	89	69	70	68	55	45	47	50	52	68	613	23.9%
Motorcyclist	33	36	30	21	28	32	31	45	36	41	333	13.0%
Pedestrian	32	34	20	28	32	31	30	37	49	39	332	12.9%
Bicyclist	6	4	5	7	5	3	6	9	5	5	55	2.1%
Total	299	276	244	253	243	217	220	256	278	281	2,567	100.0%



- During the last 10 years, 2,567 people died in a crash; 48.1% were drivers, 23.9% were passengers, 13.0% were motorcyclists, 12.9% were pedestrians, and 2.1% were bicyclists.
- The number of pedestrians killed in 2015 was the highest amount in the last 10 years.
- The number of drivers killed in 2015 was the highest amount since 2007.
- The number of motorcyclists killed in 2014 was the highest amount in the last 10 years.

Traffic Deaths by Selected Contributing Factors (Utah 2007-2016)

Crash Factor	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
Speed	134	126	123	118	101	92	87	110	104	105	1,100	42.9%
Unrestrained Occupant	82	78	91	86	82	79	59	72	87	80	796	31.0%
Drunk Driver	42	34	31	25	39	20	23	45	37	36	332	12.9%
Failed to Yield	32	38	34	34	27	27	23	30	30	45	320	12.5%
Distraction	28	18	21	19	21	20	17	22	28	26	220	8.6%
Drowsy Driver	46	29	23	13	7	14	14	6	15	20	187	7.3%
Red Light/Stop Sign Running	15	19	26	18	18	14	16	18	18	18	180	7.0%
Followed Too Close	4	9	12	7	14	11	9	9	10	9	94	3.7%
Total Deaths	299	276	244	253	243	217	220	256	278	281	2,567	



- During the last 10 years, speed was the leading contributing factor accounting for 42.9% of deaths.
- Nearly one-third of the deaths were to unrestrained occupants. It is estimated that if everyone who died was restrained then 398 of these lives would have been saved.
- In 2016, deaths involving failing to yield were the highest in the last 10 years.

Counties

Traffic Deaths by County (Utah 2007-2016)

County	Deaths										Total		Rate per
	Year										#	%	Year per 100 Million VMT
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016			
San Juan	16	15	7	2	7	8	7	8	5	10	85	3.3%	2.56
Wayne	0	1	3	0	0	1	3	3	1	0	12	0.5%	2.19
Kane	5	3	4	3	5	4	2	3	5	2	36	1.4%	2.17
Garfield	3	2	3	3	3	3	2	4	0	5	28	1.1%	2.15
Piute	2	2	0	0	1	0	0	0	0	1	6	0.2%	1.84
Sanpete	7	5	4	7	1	1	9	3	4	4	45	1.8%	1.81
Daggett	1	0	0	1	0	2	0	0	1	1	6	0.2%	1.73
Duchesne	4	2	6	10	10	3	4	9	2	1	51	2.0%	1.56
Uintah	9	10	6	6	7	9	2	8	5	3	65	2.5%	1.48
Tooele	10	15	11	12	10	17	8	15	14	20	132	5.1%	1.46
Rich	0	1	2	2	0	1	0	2	0	0	8	0.3%	1.46
Sevier	7	7	5	5	5	2	8	2	3	9	53	2.1%	1.45
Emery	7	8	6	5	5	2	6	2	6	9	56	2.2%	1.44
Wasatch	11	1	4	1	5	6	3	5	9	7	52	2.0%	1.29
Millard	15	7	5	7	3	10	7	4	9	5	72	2.8%	1.27
Carbon	5	2	3	2	9	2	4	4	8	3	42	1.6%	1.20
Grand	5	4	8	7	1	2	3	7	6	4	47	1.8%	1.16
Morgan	0	2	2	0	4	1	0	4	2	1	16	0.6%	1.07
Weber	25	15	23	21	21	13	18	16	21	19	192	7.5%	1.07
Box Elder	17	9	9	12	9	4	5	13	16	10	104	4.1%	1.03
Juab	8	5	8	7	5	1	3	2	0	5	44	1.7%	0.98
Washington	22	18	10	17	9	11	14	18	17	15	151	5.9%	0.91
Summit	6	12	10	5	9	8	4	6	7	4	71	2.8%	0.83
Beaver	3	2	6	1	1	1	4	2	5	0	25	1.0%	0.83
Cache	6	5	10	6	4	6	10	12	4	12	75	2.9%	0.75
Iron	8	3	12	8	10	0	8	3	2	4	58	2.3%	0.69
Salt Lake	54	64	46	61	66	64	53	66	76	69	619	24.1%	0.63
Utah	24	42	21	32	19	20	21	24	39	31	273	10.6%	0.58
Davis	19	14	10	10	14	15	12	11	11	27	143	5.6%	0.48
Total	299	276	244	253	243	217	220	256	278	281	2,567	100.0%	0.83

- During the last 10 years, nearly one-fourth (24.1%) of the traffic deaths occurred in Salt Lake County.
- Salt Lake, Utah, Weber, Washington, Davis, Tooele, and Box Elder Counties all had over 100 deaths over the last 10 years.
- Urban Counties accounted for 56.6% of the deaths.
- Over the last 10 years, Salt Lake County in 2015 had the highest number of deaths (76).
- Beaver, Daggett, Garfield, Iron, Juab, Morgan, Piute, Rich, and Wayne Counties had at least one year with no deaths.
- In 2016, Cache, Davis, Emery, Garfield, Sevier, and Tooele Counties had their highest total of deaths during the last 10 years.
- In 2016, Beaver, Duchesne, Kane, Rich, Summit, and Wayne Counties had their lowest total of deaths during the last 10 years.
- San Juan, Wayne, and Kane Counties had the highest death rate per vehicle mile traveled over the last 10 years.
- Davis, Utah, and Salt Lake Counties had the lowest death rate per vehicle mile traveled over the last 10 years.

Counties

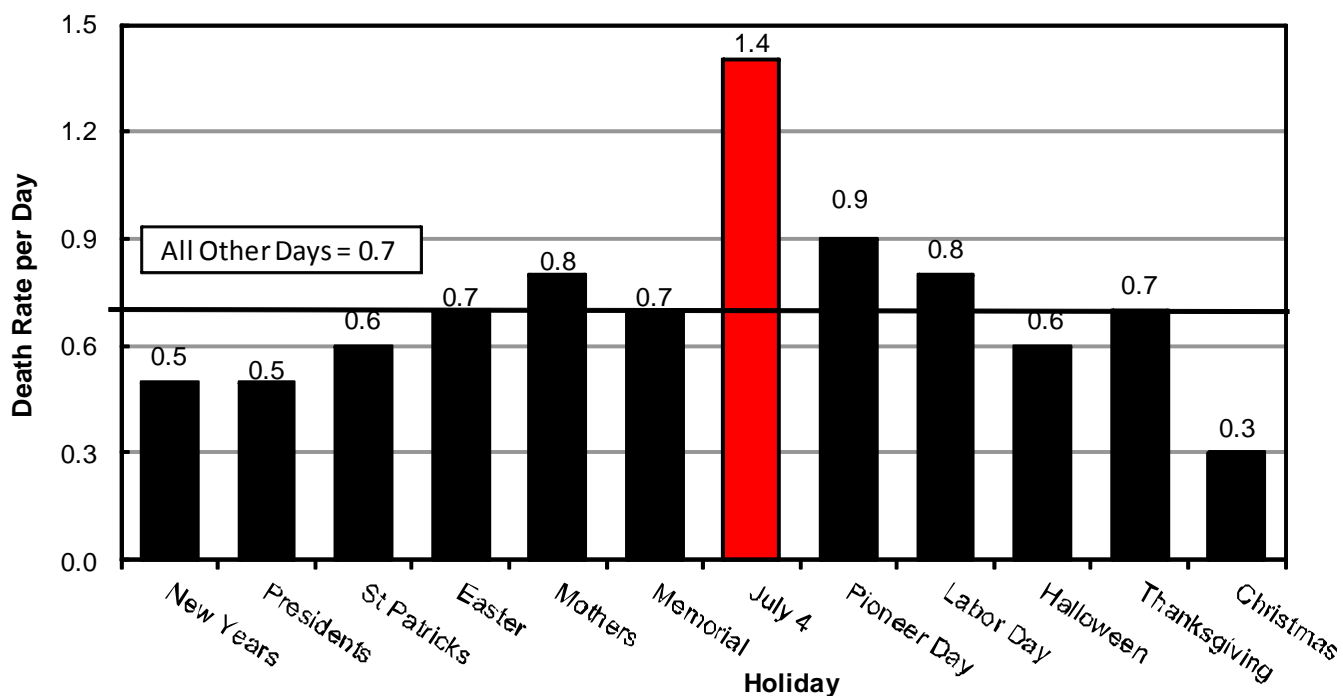
Crashes by County (Utah 2007-2016)

County	Crashes										Total		Rate per Year per 100 Million VMT
	Year										#	%	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016			
Salt Lake	26,883	24,803	22,630	21,506	21,730	21,953	25,683	24,833	27,153	28,287	245,461	44.4%	249.4
Weber	4,870	4,333	4,082	3,872	3,849	3,910	4,181	4,037	4,314	4,413	41,861	7.6%	233.1
Cache	2,219	2,018	1,890	1,987	1,959	1,688	1,933	1,808	2,084	2,064	19,650	3.6%	197.3
Utah	9,530	8,431	7,558	7,589	9,495	7,789	7,625	7,444	8,805	9,365	83,631	15.1%	177.1
Davis	5,410	4,854	4,286	3,958	4,301	4,251	5,088	4,689	5,322	5,776	47,935	8.7%	162.0
Wasatch	724	637	524	554	585	592	570	584	759	726	6,255	1.1%	155.7
Uintah	861	816	681	542	564	673	676	581	564	499	6,457	1.2%	147.4
Duchesne	501	564	343	446	584	520	476	463	439	302	4,638	0.8%	141.6
Rich	84	95	83	79	79	79	70	62	65	81	777	0.1%	141.4
Garfield	204	189	143	178	147	161	134	148	190	230	1,724	0.3%	132.5
Summit	1,084	1,165	1,031	986	1,041	1,076	1,146	1,258	1,182	1,193	11,162	2.0%	130.3
Washington	2,435	2,104	1,871	1,656	1,768	1,936	2,071	2,210	2,575	2,706	21,332	3.9%	128.4
Kane	220	240	216	201	206	196	181	195	227	208	2,090	0.4%	125.7
Sanpete	393	300	244	228	308	302	296	318	364	364	3,117	0.6%	125.6
Carbon	458	494	505	414	566	406	346	384	397	385	4,355	0.8%	124.2
Wayne	58	104	77	56	46	54	52	67	76	64	654	0.1%	119.6
Sevier	536	483	548	430	420	386	337	333	397	390	4,260	0.8%	116.3
Morgan	171	214	129	173	154	147	194	174	173	166	1,695	0.3%	113.8
Box Elder	918	1,066	1,117	1,040	1,056	1,006	1,035	1,017	1,043	1,359	10,657	1.9%	105.6
Tooele	869	802	796	730	1,016	972	1,052	1,003	1,116	1,107	9,463	1.7%	104.8
Iron	901	819	829	886	722	791	821	843	956	951	8,519	1.5%	102.1
Daggett	50	55	36	27	22	34	35	33	35	14	341	0.1%	98.3
Piute	39	24	30	34	29	24	21	40	30	39	310	0.1%	95.0
Beaver	212	240	309	274	258	255	250	223	221	251	2,493	0.5%	82.5
San Juan	331	303	262	254	233	266	273	259	256	266	2,703	0.5%	81.6
Juab	368	337	393	352	341	274	273	256	307	353	3,254	0.6%	72.4
Millard	431	401	353	407	318	372	362	334	388	434	3,800	0.7%	67.3
Emery	257	251	216	281	256	246	245	220	289	256	2,517	0.5%	64.6
Grand	228	225	185	228	234	241	211	220	285	222	2,279	0.4%	56.2
Total	61,245	56,367	51,367	49,368	52,287	50,600	55,637	54,036	60,012	62,471	553,390	100.0%	179.8

- During the last 10 years, nearly one-half (44.4%) of the traffic crashes occurred in Salt Lake County.
- Salt Lake, Utah, Davis, Weber, and Washington Counties all had over 20,000 crashes over the last 10 years.
- Urban Counties accounted for 83.1% of the crashes.
- Over the last 10 years, Salt Lake County in 2016 had the highest number of crashes (28,287).
- In 2016, Box Elder, Davis, Garfield, Millard, Salt Lake, and Washington Counties had their highest total of crashes during the last 10 years.
- In 2016, Daggett, Duchesne, and Uintah Counties had their lowest total of crashes during the last 10 years.
- Salt Lake, Weber, and Cache Counties had the highest crash rate per vehicle mile traveled over the last 10 years.
- Grand, Emery, and Millard Counties had the lowest crash rate per vehicle mile traveled over the last 10 years.

Holidays

Holiday Death Rate Per Day (Utah 2007-2016)



Holiday Deaths

Year	New Years		Presidents		St Patricks		Easter		Mothers		Memorial Day		4th of July		Pioneer Day		Labor Day		Hallow- een		Thanks- giving		Christ- mas		Total		
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Days	Rate per Day		
2007	0	0.0	1	0.3	3	1.0	2	0.7	1	0.3	2	0.5	3	1.0	4	1.3	6	1.5	5	1.7	6	1.2	1	0.3	34	40	0.9
2008	2	0.7	1	0.3	6	1.5	0	0.0	1	0.3	5	1.3	12	3.0	4	0.8	2	0.5	0	0.0	3	0.6	1	0.2	37	48	0.8
2009	1	0.2	3	0.8	2	0.7	4	1.3	2	0.7	4	1.0	1	0.3	1	0.3	2	0.5	1	0.3	0	0.0	0	0.0	21	45	0.5
2010	2	0.5	0	0.0	1	0.3	2	0.7	5	1.7	3	0.8	4	1.3	2	0.7	3	0.8	0	0.0	6	1.2	0	0.0	28	42	0.7
2011	3	1.0	0	0.0	0	0.0	1	0.3	0	0.0	1	0.3	3	0.8	1	0.3	3	0.8	5	1.3	0	0.0	1	0.3	18	45	0.4
2012	0	0.0	3	0.8	0	0.0	0	0.0	6	2.0	0	0.0	0	0.0	2	0.7	3	0.8	1	0.3	5	1.0	2	0.7	22	41	0.5
2013	0	0.0	3	0.8	0	0.0	5	1.7	2	0.7	5	1.3	10	2.0	1	0.3	3	0.8	0	0.0	4	0.8	0	0.0	33	44	0.8
2014	5	1.7	4	1.0	3	0.8	1	0.3	2	0.7	2	0.5	10	2.5	7	1.4	3	0.8	4	1.0	3	0.6	1	0.2	45	48	0.9
2015	1	0.2	1	0.3	2	0.7	2	0.7	1	0.3	3	0.8	1	0.3	1	0.3	4	1.0	3	1.0	2	0.4	1	0.3	22	45	0.5
2016	4	1.0	2	0.5	4	0.8	3	1.0	4	1.3	4	1.0	6	1.5	9	3.0	4	1.0	3	0.8	6	1.2	3	1.0	52	46	1.1
Total	18	0.5	18	0.5	21	0.6	20	0.7	24	0.8	29	0.7	50	1.4	32	0.9	33	0.8	22	0.6	35	0.7	10	0.3	312	444	0.7

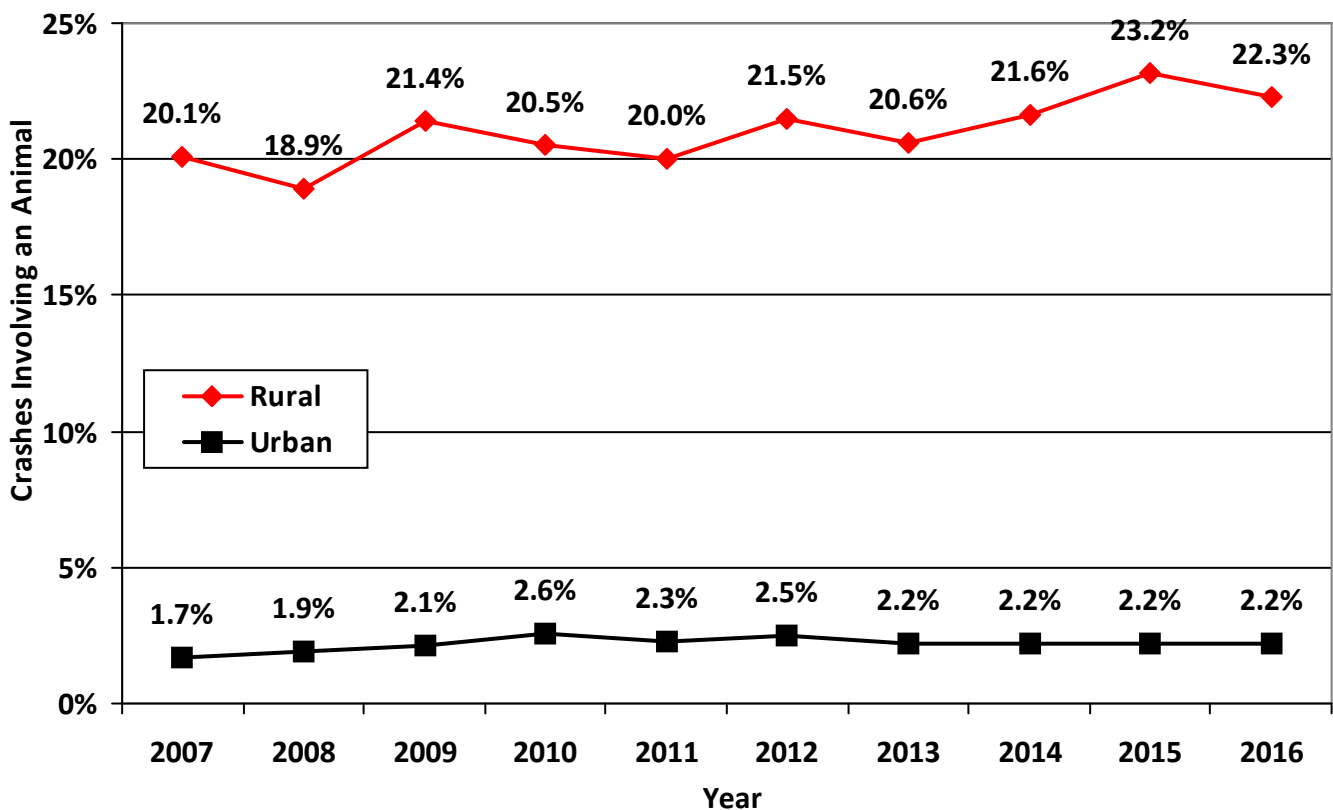
- Holiday deaths are a concern due to risk factors such as fatigue, impaired driving, long distance traveling, speeding, and traveling on unfamiliar roadways.
- Over the past 10 years, the 4th of July Holiday (1.4) had the highest rate of deaths while the Christmas (0.3) Holiday had the lowest rates.
- In 2016, the Pioneer Day Holiday had the highest death rate per day (3.0) while the President's Day Holiday had the lowest rate (0.5).
- 4th of July 2008 (3.0), Pioneer Day 2016 (3.0), 4th of July 2014 (2.5), Mother's Day 2012 (2.0), and 4th of July 2013 (2.0) had the highest death rates per day.

Note: Because of the differing lengths of holiday periods, the rate per day is provided and should be used for comparisons.

Animal-Related Crashes

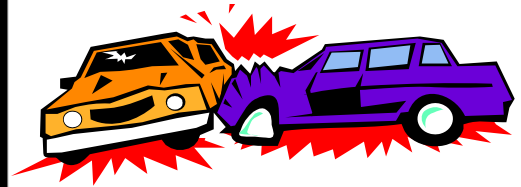
Animal-Related Crashes by Rural and Urban (Utah 2007-2016)

Animal-Related Crashes									
Year	Rural			Urban			Total		
	All	Animal	%	All	Animal	%	All	Animal	%
	#	#	%	#	#	%	#	#	%
2007	9,898	1,994	20.1%	51,347	897	1.7%	61,245	2,891	4.7%
2008	9,824	1,856	18.9%	46,543	884	1.9%	56,367	2,740	4.9%
2009	9,050	1,933	21.4%	42,317	879	2.1%	51,367	2,812	5.5%
2010	8,800	1,805	20.5%	40,568	1,059	2.6%	49,368	2,864	5.8%
2011	9,185	1,838	20.0%	43,102	991	2.3%	52,287	2,829	5.4%
2012	9,073	1,952	21.5%	41,527	1,024	2.5%	50,600	2,976	5.9%
2013	9,056	1,868	20.6%	46,581	1,042	2.2%	55,637	2,910	5.2%
2014	9,015	1,943	21.6%	45,021	988	2.2%	54,036	2,931	5.4%
2015	9,760	2,267	23.2%	50,252	1,114	2.2%	60,012	3,381	5.6%
2016	9,860	2,196	22.3%	52,611	1,147	2.2%	62,471	3,343	5.4%
Total	93,521	19,652	21.0%	459,869	10,025	2.2%	553,390	29,677	5.4%



- Over the last 10 years, animal-related crashes accounted for 5.4% of all crashes in Utah. While animal crashes accounted for a minimal amount of crashes in Urban areas (2.2%), animal crashes accounted for over one-fifth (21.0%) of the crashes in Rural areas.
- Crashes in Rural areas involving an animal have shown an increasing trend while Urban area animal crashes have remained level.
- While animal crashes comprised 5.4% of total crashes statewide in 2016, they accounted for nearly one-fourth (22.3%) of crashes in rural counties.

Overview



Section 1: Overview

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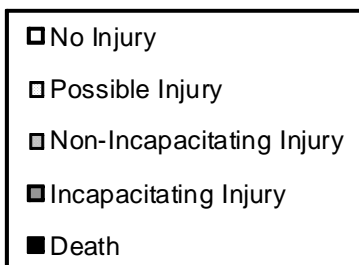
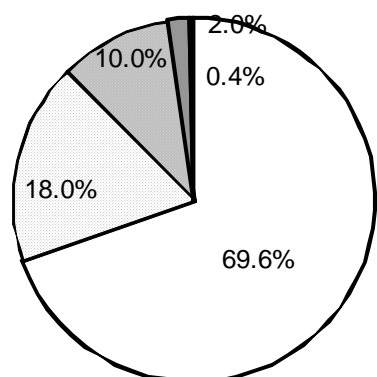


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Crash Conditions

Crash Severity (Utah 2016)



- For crashes that occurred in Utah during 2016, 69.6% resulted in property damage only, 30% resulted in some level of injury, and 0.4% involved a death.

Month (Utah 2016)

Crashes								
Month	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	4,128	133.2	1,475	47.6	13	0.42	5,616	181.2
February	3,295	113.6	1,296	44.7	16	0.55	4,607	158.9
March	3,240	104.5	1,411	45.5	14	0.45	4,665	150.5
April	3,167	105.6	1,440	48.0	23	0.77	4,630	154.3
May	3,336	107.6	1,560	50.3	28	0.90	4,924	158.8
June	3,372	112.4	1,622	54.1	30	1.00	5,024	167.5
July	3,245	104.7	1,603	51.7	30	0.97	4,878	157.4
August	3,509	113.2	1,670	53.9	15	0.48	5,194	167.5
September	3,720	124.0	1,769	59.0	27	0.90	5,516	183.9
October	3,595	116.0	1,651	53.3	27	0.87	5,273	170.1
November	4,385	146.2	1,633	54.4	25	0.83	6,043	201.4
December	4,473	144.3	1,617	52.2	11	0.35	6,101	196.8
Total	43,465	118.8	18,747	51.2	259	0.71	62,471	170.7

- Total crash rates per day were highest in November and December.
- Total crash rates per day were lowest in March and April.
- The highest rate per day for fatal crashes occurred during June and the lowest fatal rate occurred in December.

Day of Week (Utah 2016)

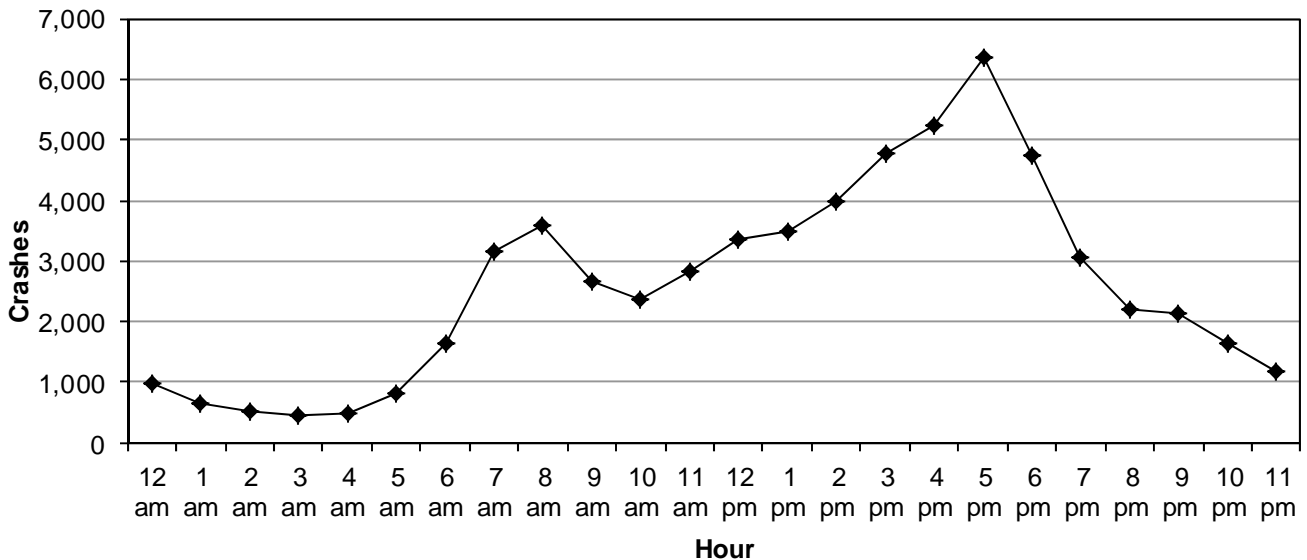
Crashes								
Day of Week	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Sunday	3,564	8.2%	1,586	8.5%	34	13.1%	5,184	8.3%
Monday	6,933	16.0%	2,896	15.4%	35	13.5%	9,864	15.8%
Tuesday	6,648	15.3%	2,832	15.1%	31	12.0%	9,511	15.2%
Wednesday	6,620	15.2%	2,830	15.1%	41	15.8%	9,491	15.2%
Thursday	6,702	15.4%	2,926	15.6%	33	12.7%	9,661	15.5%
Friday	7,442	17.1%	3,152	16.8%	41	15.8%	10,635	17.0%
Saturday	5,556	12.8%	2,525	13.5%	44	17.0%	8,125	13.0%
Total	43,465	100.0%	18,747	100.0%	259	100.0%	62,471	100.0%

- The highest percentage of total crashes occurred on Friday.
- The highest percentage of fatal crashes occurred on Saturday.
- Crashes on the weekend were 1.6 times more likely to be fatal than weekday crashes.

Crash Conditions

Hour (Utah 2016)

Hour	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Midnight	681	1.6%	307	1.6%	5	1.9%	993	1.6%
1 a.m.	429	1.0%	226	1.2%	5	1.9%	660	1.1%
2 a.m.	359	0.8%	144	0.8%	7	2.7%	510	0.8%
3 a.m.	306	0.7%	140	0.7%	10	3.9%	456	0.7%
4 a.m.	327	0.8%	144	0.8%	3	1.2%	474	0.8%
5 a.m.	610	1.4%	210	1.1%	9	3.5%	829	1.3%
6 a.m.	1,220	2.8%	415	2.2%	4	1.5%	1,639	2.6%
7 a.m.	2,296	5.3%	864	4.6%	9	3.5%	3,169	5.1%
8 a.m.	2,548	5.9%	1,022	5.5%	6	2.3%	3,576	5.7%
9 a.m.	1,901	4.4%	765	4.1%	5	1.9%	2,671	4.3%
10 a.m.	1,666	3.8%	704	3.8%	9	3.5%	2,379	3.8%
11 a.m.	1,980	4.6%	852	4.5%	11	4.2%	2,843	4.6%
Noon	2,302	5.3%	1,031	5.5%	14	5.4%	3,347	5.4%
1 p.m.	2,398	5.5%	1,080	5.8%	26	10.0%	3,504	5.6%
2 p.m.	2,729	6.3%	1,230	6.6%	18	6.9%	3,977	6.4%
3 p.m.	3,304	7.6%	1,472	7.9%	14	5.4%	4,790	7.7%
4 p.m.	3,621	8.3%	1,614	8.6%	17	6.6%	5,252	8.4%
5 p.m.	4,381	10.1%	1,970	10.5%	14	5.4%	6,365	10.2%
6 p.m.	3,236	7.4%	1,510	8.1%	15	5.8%	4,761	7.6%
7 p.m.	2,151	4.9%	901	4.8%	20	7.7%	3,072	4.9%
8 p.m.	1,554	3.6%	655	3.5%	11	4.2%	2,220	3.6%
9 p.m.	1,481	3.4%	649	3.5%	10	3.9%	2,140	3.4%
10 p.m.	1,166	2.7%	484	2.6%	7	2.7%	1,657	2.7%
11 p.m.	819	1.9%	358	1.9%	10	3.9%	1,187	1.9%
Total	43,465	100.0%	18,747	100.0%	259	100.0%	62,471	100.0%



- Total crashes were more likely to occur between 3:00 p.m. and 6:59 p.m., with a peak at 5:00 p.m.
- Fatal crashes were highest during the 1:00 p.m. and 7:00 p.m. hours.

Crash Conditions

Crashes by Day of Week and Hour (Utah 2016)

Crashes								
Hour	Day of Week							Total #
	Sun	Mon	Tue	Wed	Thu	Fri	Sat	
Midnight	211	112	111	105	131	148	175	993
1 a.m.	169	68	55	70	73	94	132	661
2 a.m.	124	56	45	54	51	72	107	509
3 a.m.	103	42	45	32	52	79	103	456
4 a.m.	77	70	57	49	60	74	87	474
5 a.m.	103	157	126	140	105	128	71	830
6 a.m.	105	303	285	279	252	261	153	1,638
7 a.m.	153	586	614	596	569	474	177	3,169
8 a.m.	178	670	650	630	577	585	287	3,577
9 a.m.	196	449	451	403	450	428	295	2,672
10 a.m.	233	356	369	314	334	369	404	2,379
11 a.m.	225	486	399	403	393	482	455	2,843
Noon	250	492	502	467	535	546	555	3,347
1 p.m.	292	576	468	467	488	622	590	3,503
2 p.m.	309	642	566	620	605	702	532	3,976
3 p.m.	315	792	750	733	758	881	561	4,790
4 p.m.	313	852	854	839	861	963	569	5,251
5 p.m.	344	1,053	1,103	1,120	1,101	1,055	590	6,366
6 p.m.	321	758	758	807	772	856	490	4,762
7 p.m.	286	401	432	460	473	569	451	3,072
8 p.m.	265	332	287	287	318	373	357	2,219
9 p.m.	271	274	241	275	335	381	362	2,139
10 p.m.	184	198	188	218	237	288	345	1,658
11 p.m.	158	138	154	124	133	202	278	1,187
Total	5,185	9,863	9,510	9,492	9,663	10,632	8,126	62,471

High = 500+
Medium = 200-499
Low = 0-199

- Crashes were highest Monday through Saturday 12:00 p.m. to 6:59 p.m. and Monday through Thursday 7:00 a.m. to 8:59 a.m.
- Crashes were lowest everyday 11:00 p.m. to 5:59 a.m.

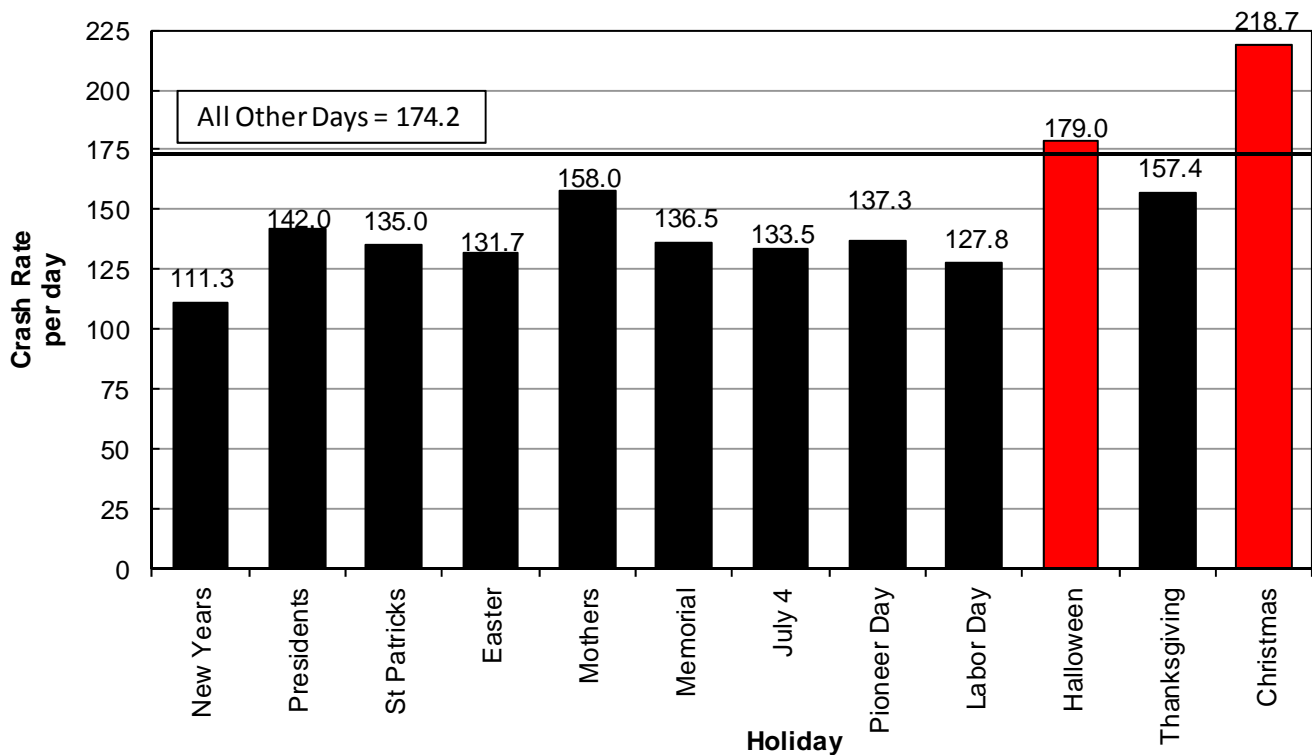
Road Surface Condition (Utah 2016)

Crashes								
Road Surface Condition	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Dry	34,658	79.7%	15,680	83.6%	221	85.3%	50,559	80.9%
Wet	4,537	10.4%	1,902	10.1%	15	5.8%	6,454	10.3%
Snow/Slush	2,742	6.3%	685	3.7%	6	2.3%	3,433	5.5%
Ice	898	2.1%	229	1.2%	3	1.2%	1,130	1.8%
Other	215	0.5%	175	0.9%	5	1.9%	395	0.6%
Unknown	415	1.0%	76	0.4%	9	3.5%	500	0.8%
Total	43,465	100.0%	18,747	100.0%	259	100.0%	62,471	100.0%

- Most total crashes (81%) and fatal crashes (85%) occurred when roads were dry.

Holidays

Holiday Crash Rate Per Day (Utah 2016)



Holiday Crashes			
Holiday	#	Days	Rate Per Day
New Years	445	4	111.3
Presidents	568	4	142.0
St Patricks	675	5	135.0
Easter	395	3	131.7
Mothers	474	3	158.0
Memorial Day	546	4	136.5
4th of July	534	4	133.5
Pioneer Day	412	3	137.3
Labor Day	511	4	127.8
Halloween	716	4	179.0
Thanksgiving	787	5	157.4
Christmas	656	3	218.7
Total	6,719	46	146.1
All Other Days	55,752	320	174.2

- The total number of miles traveled decreases during holidays. Corresponding with this reduced travel, crashes also were lower during holiday periods (146 per day compared to 174 per day)
- The Christmas Holiday had the highest crash rate per day (219) while the New Years Holiday had the lowest rate (111).
- Only the Christmas (219) and Halloween (179) Holidays had a higher crash rate per day than the rate per day for all days (174).

Note: Because of the differing lengths of holiday periods, the rate per day is provided and should be used for comparisons.

Crash Conditions

County Crash Comparison (Utah 2016)

County Crash Comparison														
County	Fatal Crash Rate per VMT Rank	Overall Crash Rate per VMT Rank	Percent of Crash Occupants Unrestrained Rank	Speed Crash Rate per VMT Rank	Alcohol-Related Crash Rate per VMT Rank	Drug-Related Crash Rate per VMT Rank	Dis-tracted Driver Crash Rate per VMT Rank	Drowsy Driver Crash Rate per VMT Rank	Crash % With Teen Driver Rank	Crash % With Older Driver Rank	Motor-cycle Crash Rate per Rgstrd Mtrcycl Rank	Pedes-trian Crash Rate per Pop. Rank	Bicy-clist Crash Rate per Pop. Rank	Total County Highway Safety Ranking
Weber	14	2	24	11	2	1	2	12	6	9	16	4	2	8.1
Salt Lake	20	1	25	2	1	2	1	13	13	21	14	2	1	8.9
Wasatch	7	6	20	1	4	20	13	5	9	20	10	5	9	9.9
Cache	12	3	26	7	8	14	3	15	2	17	19	8	8	10.9
Tooele	5	14	9	19	3	4	7	8	10	22	20	11	10	10.9
Washington	18	8	23	23	5	11	6	11	4	2	11	9	11	10.9
Garfield	1	7	14	9	15	13	16	22	28	6	3	10	4	11.4
Davis	19	5	28	12	11	6	5	14	5	11	26	6	5	11.8
Utah	22	4	27	6	19	5	4	16	3	24	21	7	6	12.6
Sevier	8	21	5	18	13	3	15	4	19	8	25	13	16	12.9
Box Elder	15	12	17	4	22	26	12	2	8	15	17	1	19	13.1
Sanpete	9	10	2	17	7	15	9	26	1	7	27	19	21	13.1
Iron	23	17	18	14	16	9	10	23	11	10	9	12	18	14.6
Rich	27	9	6	5	10	18	14	18	14	29	1	20	22	14.8
Piute	2	15	1	22	24	28	26	3	29	1	2	20	22	15.0
Wayne	27	16	8	15	9	17	8	17	26	13	4	20	22	15.5
Beaver	27	23	3	8	20	16	19	6	17	19	6	20	22	15.8
Summit	24	11	19	10	6	23	17	20	21	25	23	3	12	16.5
Carbon	17	20	15	21	17	24	20	10	12	5	28	16	14	16.8
Emery	6	27	7	24	23	21	25	9	22	12	13	20	15	17.2
Uintah	25	18	13	25	12	7	18	28	7	18	15	18	20	17.2
Morgan	21	19	21	3	14	8	22	19	16	28	12	20	22	17.3
Grand	13	28	11	29	28	27	21	21	23	4	8	14	3	17.7
Millard	16	26	10	13	25	22	23	7	20	23	18	20	7	17.7
Juab	11	25	12	16	27	25	27	1	15	16	24	17	17	17.9
Duchesne	26	22	4	20	18	12	11	24	18	27	29	15	13	18.4
Daggett	3	29	29	26	29	10	28	29	25	3	5	20	22	19.8
San Juan	4	24	16	27	26	28	29	25	27	14	7	20	22	20.7
Kane	10	13	22	28	21	19	24	27	24	26	22	20	22	21.4
Note:	Rank 1-18 Above State Avg.	Rank 1-3 Above State Avg.	Rank 1-20 Above State Avg.	Rank 1-6 Above State Avg.	Rank 1-3 Above State Avg.	Rank 1-4 Above State Avg.	Rank 1-5 Above State Avg.	Rank 1-13 Above State Avg.	Rank 1-8 Above State Avg.	Rank 1-17 Above State Avg.	Rank 1-15 Above State Avg.	Rank 1-3 Above State Avg.	Rank 1-2 Above State Avg.	Total Safety Ranking Average = 14.8

This is a comparison developed to evaluate the different counties using a County Highway Safety Ranking. Each County is ranked with 1 being the worst ranking and 29 being the best ranking on various categories. The bottom row shows what counties ranked above the state average for that category. Counties above the state average are marked in gray for that category. The average of all the categories was taken to arrive at an overall ranking.

- Weber, Salt Lake, and Wasatch Counties were the worst overall counties. Weber County was above the state average in nine of the thirteen categories.
- Kane, San Juan, and Daggett Counties were the best overall counties. Kane County was below the state average in every category except one.
- In 2015, Salt Lake was the worst county and Juab was the best. In 2014, Salt Lake was the worst county and Millard was the best. In 2013, Weber was the worst county and Piute was the best. In 2012, Weber was the worst county and Juab was the best. In 2011, Duchesne was the worst county and Millard was the best.

Crash Conditions

Crashes by County (Utah 2016)

County	Crashes							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT
Salt Lake	19,674	199.9	8,546	86.8	67	0.68	28,287	287.4
Weber	2,836	157.9	1,560	86.9	17	0.95	4,413	245.7
Cache	1,557	156.3	496	49.8	11	1.10	2,064	207.2
Utah	6,376	135.0	2,960	62.7	29	0.61	9,365	198.3
Davis	3,972	134.3	1,780	60.2	24	0.81	5,776	195.2
Wasatch	554	137.9	165	41.1	7	1.74	726	180.7
Garfield	165	126.8	60	46.1	5	3.84	230	176.7
Washington	1,845	111.1	847	51.0	14	0.84	2,706	162.9
Rich	58	105.5	23	41.8	0	0.00	81	147.4
Sanpete	265	106.8	95	38.3	4	1.61	364	146.7
Summit	898	104.8	291	34.0	4	0.47	1,193	139.2
Box Elder	972	96.3	378	37.4	9	0.89	1,359	134.6
Kane	156	93.8	50	30.1	2	1.20	208	125.1
Tooele	749	83.0	340	37.7	18	1.99	1,107	122.6
Piute	28	85.8	10	30.7	1	3.07	39	119.6
Wayne	40	73.1	24	43.9	0	0.00	64	117.0
Iron	698	83.6	249	29.8	4	0.48	951	113.9
Uintah	397	90.6	100	22.8	2	0.46	499	113.9
Morgan	131	88.0	34	22.8	1	0.67	166	111.5
Carbon	292	83.3	90	25.7	3	0.86	385	109.8
Sevier	274	74.8	110	30.0	6	1.64	390	106.5
Duchesne	234	71.4	67	20.5	1	0.31	302	92.2
Beaver	175	57.9	76	25.2	0	0.00	251	83.1
San Juan	220	66.4	38	11.5	8	2.41	266	80.3
Juab	262	58.3	86	19.1	5	1.11	353	78.6
Millard	301	53.3	128	22.7	5	0.89	434	76.8
Emery	170	43.6	79	20.3	7	1.80	256	65.7
Grand	153	37.7	65	16.0	4	0.99	222	54.7
Daggett	13	37.5	0	0.0	1	2.88	14	40.4
Statewide	43,465	141.2	18,747	60.9	259	0.84	62,471	203.0

- Salt Lake (287), Weber (246), and Cache (207) Counties had the highest total crash rates per vehicle miles traveled (VMT).
- Daggett (40), Grand (55), and Emery (66) Counties had the lowest total crash rates per miles traveled.
- Garfield (3.8), Piute (3.1), and Daggett (2.9) Counties had the highest fatal crash rates per miles traveled.
- Beaver, Rich, and Wayne Counties had no fatal crashes.
- 45% of crashes occurred in Salt Lake County.

Rural/Urban Location (Utah 2016)

- While urban areas had a higher rate of total crashes per vmt, rural areas had a higher fatal crash rate.
- Crashes occurring in rural areas were 3.2 times more likely to result in a death than crashes in urban areas.

Location	Crashes							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT
Urban	36,260	165.0	16,189	73.7	162	0.737	52,611	239.4
Rural	7,205	81.9	2,558	29.1	97	1.102	9,860	112.0
Total	43,465	141.2	18,747	60.9	259	0.841	62,471	203.0

Crash Conditions

Crashes by City (Utah 2016)

Total Crash Rate for Cities With Population 5,000+ or 50+ Crashes											
Rank by Rate	Rank by Total	City	Population	Total Crashes	Rate per 10,000 Pop.	Rank by Rate	Rank by Total	City	Population	Total Crashes	Rate per 10,000 Pop.
1	55	Marriot-Slaterville	1,701	178	1,046.4	50	70	Nephi	5,389	88	163.3
2	63	Willard	1,772	120	677.2	51	28	Cottonwood Heights	33,433	541	161.8
3	73	Uintah	1,322	85	643.0	52	44	South Ogden	16,532	263	159.1
4	34	Park City	7,547	447	592.3	53	86	Hyde Park	3,833	59	153.9
5	14	South Salt Lake	23,617	1,378	583.5	54	43	Saratoga Springs	17,781	272	153.0
6	33	Riverdale	8,426	465	551.9	55	76	Moab	5,046	77	152.6
7	3	Murray	46,746	2,506	536.1	56	24	Riverton	38,753	590	152.2
8	15	Midvale	27,964	1,279	457.4	57	40	Herriman	21,785	328	150.6
9	10	Draper	40,532	1,620	399.7	58	29	Kearns	35,731	535	149.7
10	37	Lindon	10,070	390	387.3	59	36	Holladay	26,472	395	149.2
11	50	West Bountiful	5,265	194	368.5	60	9	Provo	112,488	1,670	148.5
12	48	Farr West	5,928	217	366.1	61	31	Pleasant Grove	33,509	495	147.7
13	27	North Salt Lake	16,322	581	356.0	62	66	Tremonton	7,647	112	146.5
14	2	West Valley City	129,480	4,162	321.2	63	22	Bountiful	42,552	623	146.4
15	26	Farmington	18,275	584	319.6	64	45	Brigham City	17,899	253	141.3
16	68	Wellsville	3,432	107	311.8	65	50	Hurricane	13,748	194	141.1
17	7	Taylorsville	58,652	1,760	300.1	66	35	Tooele	31,605	442	139.9
18	13	Lehi	47,407	1,387	292.6	67	72	Salem	6,423	87	135.5
19	4	Sandy	87,461	2,496	285.4	68	81	Fruit Heights	4,987	67	134.3
20	62	Perry	4,512	126	279.3	69	65	Santaquin	9,128	118	129.3
21	58	Sunset	5,122	140	273.3	70	64	Woods Cross	9,761	119	121.9
22	1	Salt Lake City	186,440	5,031	269.8	71	39	Kaysville	27,300	330	120.9
23	38	Centerville	15,335	385	251.1	72	78	South Weber	6,051	73	120.6
24	47	Vernal	9,089	220	242.1	73	67	Smithfield	9,495	110	115.9
25	17	South Jordan	50,418	1,220	242.0	74	80	Roosevelt	6,046	69	114.1
26	11	Layton	67,311	1,601	237.9	75	75	Pleasant View	7,979	78	97.8
27	23	American Fork	26,263	622	236.8	76	49	Clinton	20,426	197	96.4
28	8	St. George	72,897	1,720	235.9	77	79	Richfield	7,551	70	92.7
29	18	Logan	48,174	1,089	226.1	78	88	Plain City	5,476	50	91.3
30	53	North Logan	8,269	184	222.5	79	89	Nibley	5,438	49	90.1
31	20	Springville	29,466	654	222.0	80	83	Providence	7,075	63	89.0
32	21	Clearfield	30,112	649	215.5	81	74	Grantsville	8,893	79	88.8
33	46	West Haven	10,272	221	215.1	82	61	Highland	15,523	136	87.6
34	19	Roy	36,884	782	212.0	83	82	Hyrum	7,609	64	84.1
35	54	Price	8,715	183	210.0	84	76	West Point	9,511	77	81.0
36	6	Orem	88,328	1,805	204.4	85	60	North Ogden	17,357	137	78.9
37	56	Bluffdale	7,598	155	204.0	86	90	Ephraim	6,135	46	75.0
38	16	Millcreek	62,139	1,229	197.8	87	87	Mapleton	7,979	55	68.9
39	5	West Jordan	103,712	2,047	197.4	88	85	Washington Terrace	9,067	60	66.2
40	84	Beaver	3,112	61	196.0	89	59	Eagle Mountain	21,415	138	64.4
41	69	Harrisville	5,567	102	183.2	90	57	Syracuse	24,331	141	58.0
42	40	Payson	18,294	328	179.3	91	91	Hooper	7,218	39	54.0
43	30	Cedar City	28,857	515	178.5	92	93	Enoch	5,803	25	43.1
44	32	Magna	26,505	471	177.7	93	93	Santa Clara	6,003	25	41.6
45	42	Washington	18,761	327	174.3	94	92	Alpine	9,555	38	39.8
46	70	Stansbury Park	5,145	88	171.0	95	96	Ivins	6,753	14	20.7
47	52	Heber	11,362	193	169.9	96	95	Cedar Hills	9,796	18	18.4
48	25	Spanish Fork	34,691	585	168.6						
49	12	Ogden	82,825	1,395	168.4						
								Total	2,418,381	53,593	221.6

- The five cities with the highest rates of total crashes per population were Marriot-Slaterville, Willard, Uintah, Park City, and South Salt Lake. The five cities with the highest total number of crashes were Salt Lake City, West Valley City, Murray, Sandy, and West Jordan.
- Perry (+45), Layton (+18), and Nephi (+17) had the largest increase in rankings from 2015.
- Roosevelt (-46), Tremonton (-22), and Ephraim/South Ogden (-20) had the biggest decrease in rankings from 2015.

Crash Conditions

Light Condition (Utah 2016)

Light Condition	Crashes							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Daylight	30,528	70.2%	13,557	72.3%	155	59.8%	44,240	70.8%
Dark	11,084	25.5%	4,532	24.2%	89	34.4%	15,705	25.1%
Dawn/Dusk	1,447	3.3%	606	3.2%	13	5.0%	2,066	3.3%
Unknown	406	0.9%	52	0.3%	2	0.8%	460	0.7%
Total	43,465	100.0%	18,747	100.0%	259	100.0%	62,471	100.0%

- Nearly three-fourths (71%) of crashes occurred during daylight.
- Nearly one-half (39%) of fatal crashes occurred during dark conditions. Crashes occurring at dark were 1.5 times more likely to be fatal.

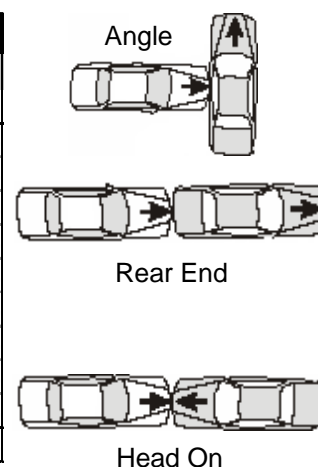
Number of Vehicles Involved (Utah 2016)

Vehicles Involved	Crashes							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
1	10,736	24.7%	4,987	26.6%	142	54.8%	15,865	25.4%
2	29,724	68.4%	10,950	58.4%	90	34.7%	40,764	65.3%
3	2,523	5.8%	2,200	11.7%	21	8.1%	4,744	7.6%
4 or more	482	1.1%	610	3.3%	6	2.3%	1,098	1.8%
Total	43,465	100.0%	18,747	100.0%	259	100.0%	62,471	100.0%

- While three-fourths (75%) of all crashes involved two or more motor vehicles, 55% of fatal crashes involved only one motor vehicle.

Collision Description (Utah 2016)

Collision Description	Crashes							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Rear End (front-to-rear)	13,690	31.5%	6,215	33.2%	15	5.8%	19,920	31.9%
Single Vehicle	11,506	26.5%	5,274	28.1%	152	58.7%	16,932	27.1%
Angle	8,940	20.6%	4,936	26.3%	56	21.6%	13,932	22.3%
Sideswipe	5,474	12.6%	972	5.2%	15	5.8%	6,461	10.3%
Parked Vehicle	2,035	4.7%	358	1.9%	4	1.5%	2,397	3.8%
Head On (front-to-front)	695	1.6%	700	3.7%	16	6.2%	1,411	2.3%
Rear to Side/Rear	327	0.8%	22	0.1%	1	0.4%	350	0.6%
Other	337	0.8%	165	0.9%	0	0.0%	502	0.8%
Unknown	461	1.1%	105	0.6%	0	0.0%	566	0.9%
Total	43,465	100.0%	18,747	100.0%	259	100.0%	62,471	100.0%



- For all crashes, the leading collision types were rear end, single vehicle, and angle.
- The leading collision types in fatal crashes were single vehicle and angle.
- Head on collisions were 2.8 times more likely to result in a death than other collision types.



Crash Conditions

Vehicle Maneuver Prior to Crash (Utah 2016)

Vehicle Maneuver	Vehicles							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Straight Ahead	42,511	53.3%	20,575	57.0%	301	73.2%	63,387	54.5%
Stopped in Traffic Lane	9,146	11.5%	5,429	15.0%	14	3.4%	14,589	12.5%
Turning Left	6,566	8.2%	3,828	10.6%	48	11.7%	10,442	9.0%
Slowing in Traffic Lane	4,770	6.0%	2,256	6.2%	7	1.7%	7,033	6.0%
Parked	3,725	4.7%	777	2.2%	9	2.2%	4,511	3.9%
Turning Right	2,936	3.7%	1,025	2.8%	2	0.5%	3,963	3.4%
Changing Lanes	2,745	3.4%	622	1.7%	2	0.5%	3,369	2.9%
Backing	2,293	2.9%	183	0.5%	4	1.0%	2,480	2.1%
Entering Traffic Lane	891	1.1%	271	0.8%	0	0.0%	1,162	1.0%
Making U-turn	741	0.9%	268	0.7%	2	0.5%	1,011	0.9%
Overtaking/Passing	477	0.6%	125	0.3%	12	2.9%	614	0.5%
Leaving Traffic Lane	419	0.5%	189	0.5%	0	0.0%	608	0.5%
Parking Maneuvers	522	0.7%	47	0.1%	0	0.0%	569	0.5%
Other	625	0.8%	262	0.7%	4	1.0%	891	0.8%
Unknown	1,448	1.8%	269	0.7%	6	1.5%	1,723	1.5%
Total	79,815	100.0%	36,126	100.0%	411	100.0%	116,352	100.0%

- For total crashes, straight ahead (55%), stopped in traffic lane (13%), and turning left (9%) were the leading vehicle maneuvers prior to the crash.
- For fatal crashes, straight ahead (73%) and turning left (12%) were the leading vehicle maneuvers.
- Overtaking/passing was one of the deadliest maneuvers to make as crashes were 5.7 times more likely to be fatal compared to other vehicle maneuvers.

Roadway Junction or Feature (Utah 2016)

Roadway Junction or Feature	Crashes							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
None	24,692	56.8%	9,030	48.2%	160	61.8%	33,882	54.2%
4-Leg Intersection	8,616	19.8%	5,517	29.4%	52	20.1%	14,185	22.7%
T-Intersection	3,730	8.6%	1,797	9.6%	20	7.7%	5,547	8.9%
Business/Residential Drive	2,141	4.9%	763	4.1%	6	2.3%	2,910	4.7%
On-Ramp/Off-Ramp	1,166	2.7%	401	2.1%	5	1.9%	1,572	2.5%
Bridge (overpass/underpass)	642	1.5%	273	1.5%	4	1.5%	919	1.5%
On-Ramp Merge/Off-Ramp Diverge Area	644	1.5%	230	1.2%	0	0.0%	874	1.4%
Other Intersection (Y, 5-Leg, Ramp w/X-rd)	438	1.0%	220	1.2%	1	0.4%	659	1.1%
Roundabout	261	0.6%	60	0.3%	1	0.4%	322	0.5%
Railroad Crossing	92	0.2%	47	0.3%	1	0.4%	140	0.2%
Other	967	2.2%	388	2.1%	5	1.9%	1,360	2.2%
Unknown	76	0.2%	21	0.1%	4	1.5%	101	0.2%
Total	43,465	100.0%	18,747	100.0%	259	100.0%	62,471	100.0%

- While the majority (54%) of all crashes occurred on a roadway with no junction or feature, 33% of crashes occurred at an intersection.

Crash Conditions

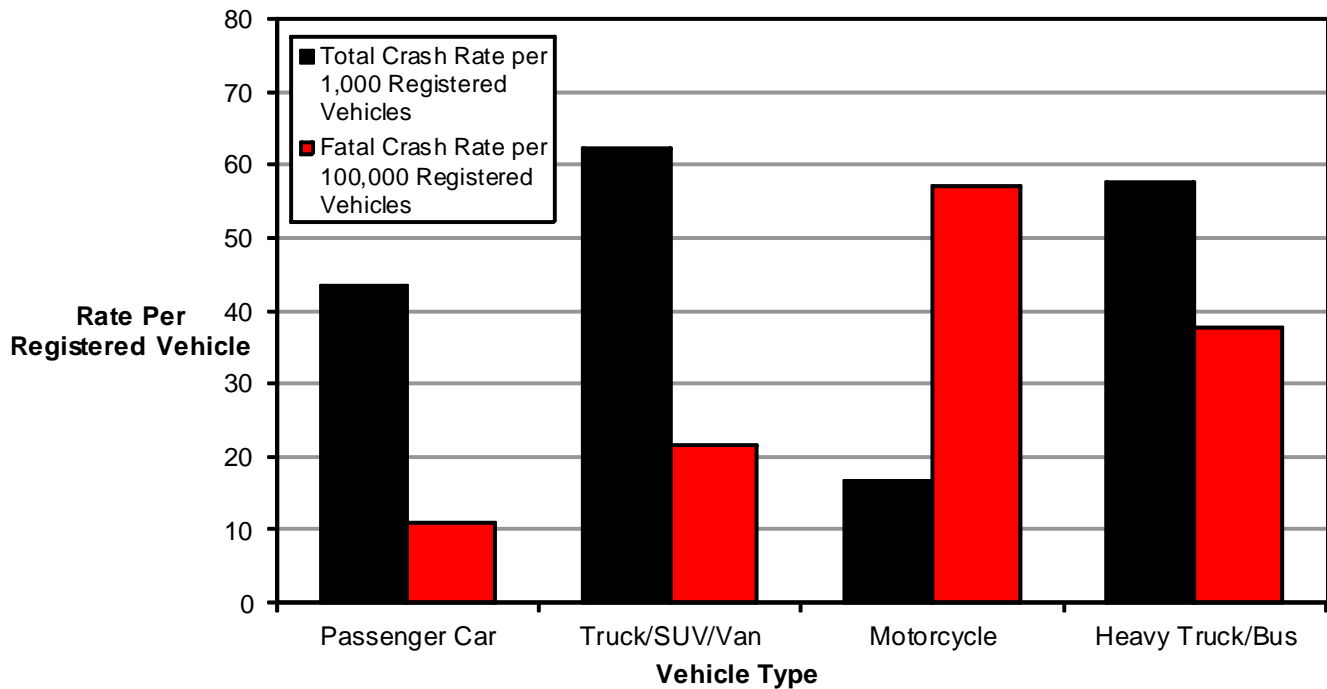
Vehicle Type (Utah 2016)



Vehicle Type	Vehicles							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Passenger Car	40,778	51.1%	18,918	52.4%	151	36.7%	59,847	51.4%
SUV	17,169	21.5%	7,925	21.9%	78	19.0%	25,172	21.6%
Pickup Truck	12,891	16.2%	5,016	13.9%	81	19.7%	17,988	15.5%
Van	4,128	5.2%	2,080	5.8%	13	3.2%	6,221	5.3%
Heavy Truck	2,917	3.7%	767	2.1%	26	6.3%	3,710	3.2%
Motorcycle	175	0.2%	972	2.7%	41	10.0%	1,188	1.0%
Bus	344	0.4%	73	0.2%	1	0.2%	418	0.4%
Off Road Vehicle	35	0.0%	146	0.4%	9	2.2%	190	0.2%
RV/Motor Home	94	0.1%	24	0.1%	1	0.2%	119	0.1%
Other	43	0.1%	13	0.0%	2	0.5%	58	0.0%
Unknown	1,241	1.6%	192	0.5%	8	1.9%	1,441	1.2%
Total	79,815	100.0%	36,126	100.0%	411	100.0%	116,352	100.0%



Crash Rates by Vehicle Type (Utah 2016)

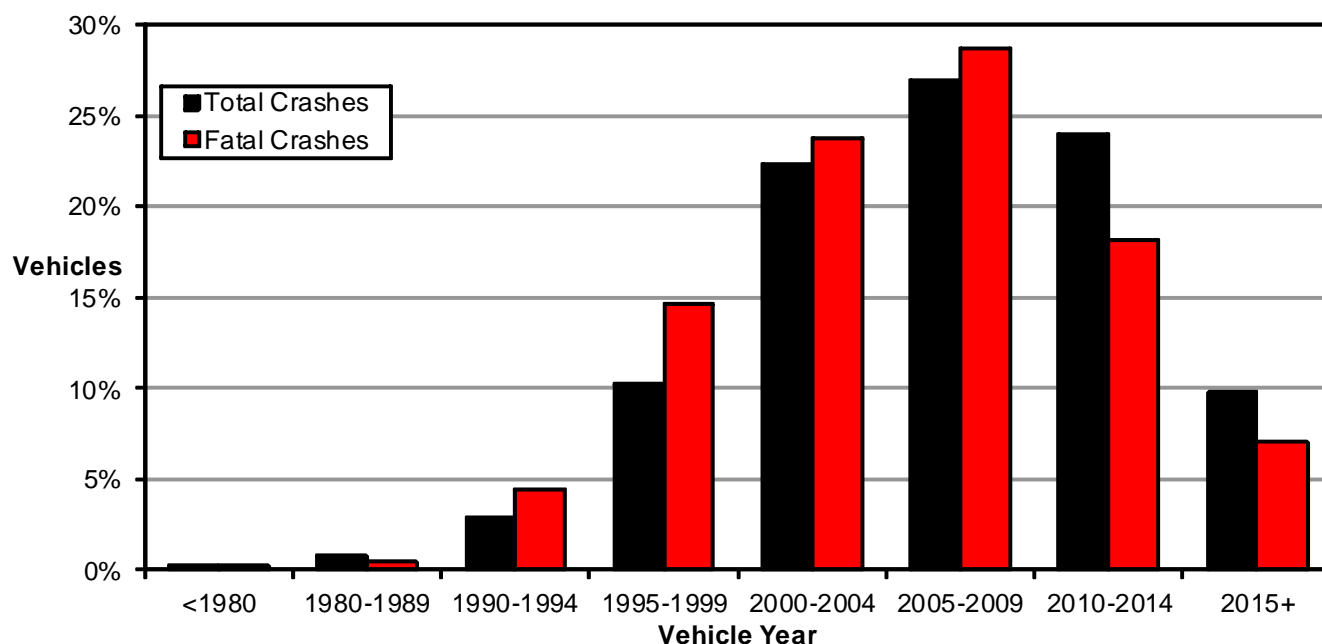


- When comparing vehicle types it is important to keep in mind that different vehicle types may have different usage patterns and thus different exposure. For example, heavy truck may travel more miles per vehicle.
- Passenger car represented 60% of registered vehicles in Utah, pickup truck/SUV/van 34%, motorcycle 3%, and heavy truck/bus 3%.
- For total crashes, passenger car (51%) and SUV (22%) were the leading vehicle types.
- Pickup truck/SUV/van had the highest total crash rates per registered vehicle.
- For fatal crashes, passenger car (37%) and pickup truck (20%) were the leading vehicle types.
- Motorcycle and heavy truck/bus had the highest fatal crash rates per registered vehicle.
- While motorcycles represented 1.0% of vehicles in total crashes, they represented 10% of vehicles in fatalities. Crashes involving a motorcycle were 11 times more likely to be fatal than crashes of other vehicles.

Crash Conditions

Vehicle Year (Utah 2016)

Vehicle Year	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
<1970	64	0.1%	26	0.1%	0	0.0%	90	0.1%
1970-1979	144	0.2%	71	0.2%	1	0.2%	216	0.2%
1980-1989	603	0.8%	305	0.8%	2	0.5%	910	0.8%
1990-1994	2,225	2.8%	1,078	3.0%	18	4.4%	3,321	2.9%
1995-1999	7,890	9.9%	3,880	10.7%	60	14.6%	11,830	10.2%
2000-2004	17,510	21.9%	8,330	23.1%	98	23.8%	25,938	22.3%
2005	4,650	5.8%	2,195	6.1%	30	7.3%	6,875	5.9%
2006	4,928	6.2%	2,220	6.1%	22	5.4%	7,170	6.2%
2007	4,818	6.0%	2,301	6.4%	27	6.6%	7,146	6.1%
2008	4,197	5.3%	1,974	5.5%	30	7.3%	6,201	5.3%
2009	2,804	3.5%	1,233	3.4%	9	2.2%	4,046	3.5%
2010	3,111	3.9%	1,389	3.8%	9	2.2%	4,509	3.9%
2011	3,295	4.1%	1,467	4.1%	12	2.9%	4,774	4.1%
2012	4,083	5.1%	1,790	5.0%	19	4.6%	5,892	5.1%
2013	4,549	5.7%	2,099	5.8%	12	2.9%	6,660	5.7%
2014	4,227	5.3%	1,833	5.1%	23	5.6%	6,083	5.2%
2015	4,516	5.7%	1,855	5.1%	16	3.9%	6,387	5.5%
2016 or newer	3,501	4.4%	1,449	4.0%	13	3.2%	4,963	4.3%
Unknown	2,700	3.4%	631	1.7%	10	2.4%	3,341	2.9%
Total	79,815	100.0%	36,126	100.0%	411	100.0%	116,352	100.0%



- Over one-half (51%) of vehicles in fatal crashes were vehicle years 2005-2014. The vehicle years 2006 and 2007 had the highest number of vehicles in fatal crashes.
- Over one-half (53%) of vehicles in crashes were vehicle years 2000-2009. The vehicle years 2005 and 2008 had the highest number of vehicles in total crashes.
- Vehicle model years 2008 and older were in slightly more fatal crashes than newer vehicles.

Crash Conditions

Vehicle Make (Utah 2016)

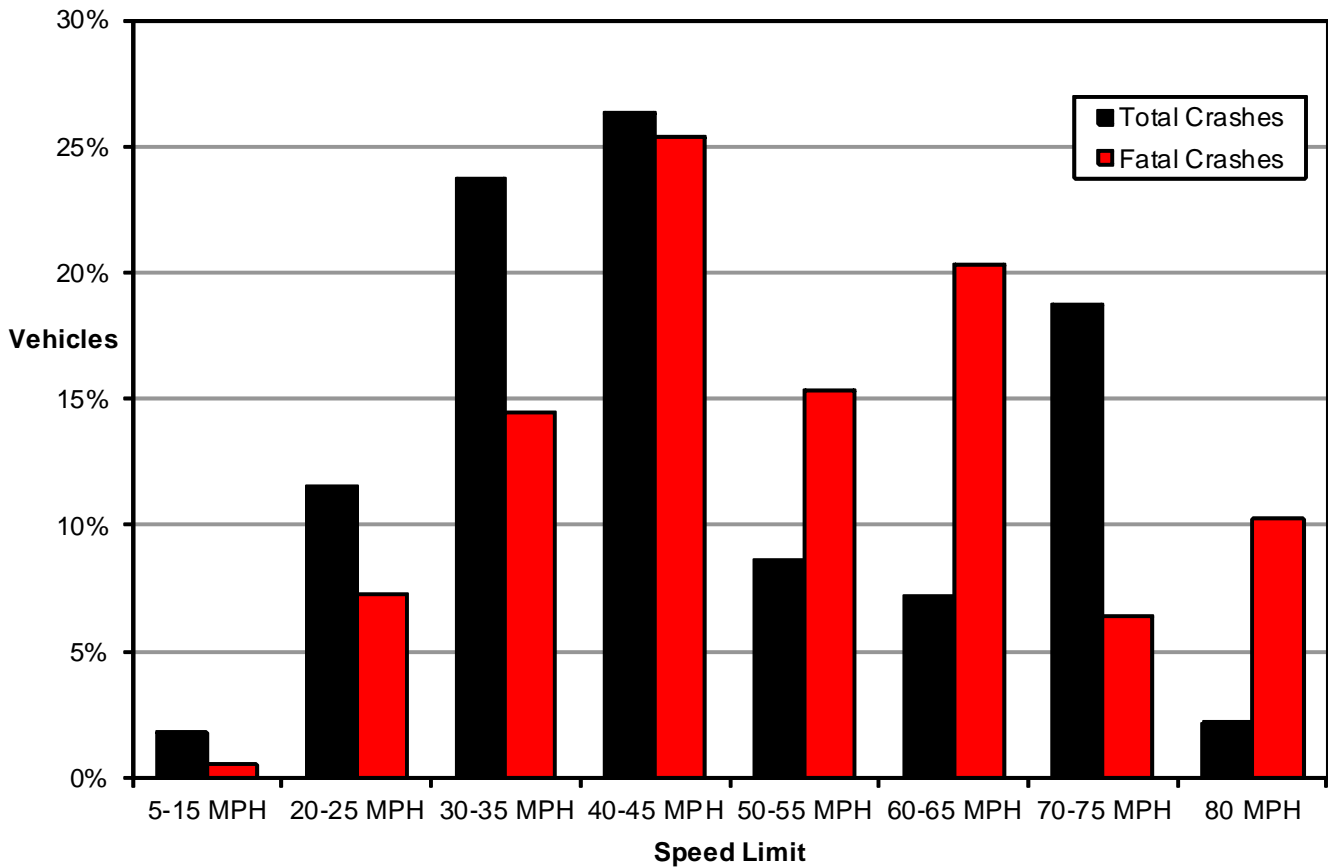
Vehicle Make	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Ford	10,193	12.8%	4,502	12.5%	57	13.9%	14,752	12.7%
Toyota	9,437	11.8%	4,256	11.8%	38	9.2%	13,731	11.8%
Chevrolet	9,059	11.3%	4,036	11.2%	44	10.7%	13,139	11.3%
Honda	6,782	8.5%	3,444	9.5%	28	6.8%	10,254	8.8%
Dodge	5,736	7.2%	2,441	6.8%	32	7.8%	8,209	7.1%
Nissan	5,136	6.4%	2,469	6.8%	0	0.0%	7,605	6.5%
Hyundai	3,256	4.1%	1,525	4.2%	14	3.4%	4,795	4.1%
Subaru	2,775	3.5%	1,165	3.2%	6	1.5%	3,946	3.4%
Jeep	2,395	3.0%	1,035	2.9%	12	2.9%	3,442	3.0%
Mazda	2,256	2.8%	1,056	2.9%	5	1.2%	3,317	2.9%
GMC	2,115	2.6%	864	2.4%	19	4.6%	2,998	2.6%
Volkswagen	1,895	2.4%	862	2.4%	7	1.7%	2,764	2.4%
Chrysler	1,457	1.8%	734	2.0%	7	1.7%	2,198	1.9%
Kia	1,448	1.8%	671	1.9%	5	1.2%	2,124	1.8%
Pontiac	1,091	1.4%	546	1.5%	9	2.2%	1,646	1.4%
Acura	878	1.1%	414	1.1%	4	1.0%	1,296	1.1%
Buick	846	1.1%	432	1.2%	5	1.2%	1,283	1.1%
Mitsubishi	902	1.1%	378	1.0%	3	0.7%	1,283	1.1%
Lexus	909	1.1%	369	1.0%	2	0.5%	1,280	1.1%
Saturn	741	0.9%	375	1.0%	5	1.2%	1,121	1.0%
BMW	674	0.8%	318	0.9%	0	0.0%	992	0.9%
Freightliner	664	0.8%	190	0.5%	7	1.7%	861	0.7%
Audi	542	0.7%	236	0.7%	3	0.7%	781	0.7%
Cadillac	533	0.7%	235	0.7%	4	1.0%	772	0.7%
Mercedes-Benz	522	0.7%	208	0.6%	2	0.5%	732	0.6%
Infiniti	441	0.6%	193	0.5%	4	1.0%	638	0.5%
Suzuki	346	0.4%	278	0.8%	6	1.5%	630	0.5%
Volvo	425	0.5%	146	0.4%	2	0.5%	573	0.5%
Mercury	371	0.5%	196	0.5%	3	0.7%	570	0.5%
Peterbilt	423	0.5%	110	0.3%	9	2.2%	542	0.5%
Kenworth	418	0.5%	101	0.3%	3	0.7%	522	0.4%
Oldsmobile	300	0.4%	178	0.5%	1	0.2%	479	0.4%
Other	2,476	3.1%	1,642	4.5%	56	13.6%	4,174	3.6%
Unknown	2,373	3.0%	521	1.4%	9	2.2%	2,903	2.5%
Total	79,815	100.0%	36,126	100.0%	411	100.0%	116,352	100.0%

- Over one-third (36%) of vehicles in crashes had the vehicle make of Ford, Toyota, or Chevrolet.
- The top 10 vehicle makes (Ford, Toyota, Chevrolet, Honda, Dodge, Nissan, Hyundai, Subaru, Jeep, and Mazda) made up nearly three-fourths (72%) of the vehicle makes in crashes.
- GMC (+2.0%), Peterbilt (+1.7%), Ford (+1.2%), and Freightliner (+1.0%) had the biggest positive difference in percent of vehicle make in fatal crashes compared to all crashes.
- Nissan (-6.5%), Toyota (-2.6%), Honda (-2.0%), Subaru (-1.9%), and Mazda (-1.6%) had the biggest negative difference in percent of vehicle make in fatal crashes compared to all crashes.

Crash Conditions

Speed Limit (Utah 2016)

Speed Limit	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
5-15 MPH	1,380	1.7%	252	0.7%	2	0.5%	1,634	1.4%
20-25 MPH	7,662	9.6%	2,931	8.1%	26	6.3%	10,619	9.1%
30-35 MPH	14,361	18.0%	7,469	20.7%	52	12.7%	21,882	18.8%
40-45 MPH	15,618	19.6%	8,627	23.9%	91	22.1%	24,336	20.9%
50-55 MPH	5,070	6.4%	2,813	7.8%	55	13.4%	7,938	6.8%
60-65 MPH	4,725	5.9%	1,821	5.0%	73	17.8%	6,619	5.7%
70-75 MPH	12,286	15.4%	4,982	13.8%	23	5.6%	17,291	14.9%
80 MPH	1,449	1.8%	549	1.5%	37	9.0%	2,035	1.7%
Unknown/None	17,264	21.6%	6,682	18.5%	52	12.7%	23,998	20.6%
Total	79,815	100.0%	36,126	100.0%	411	100.0%	116,352	100.0%

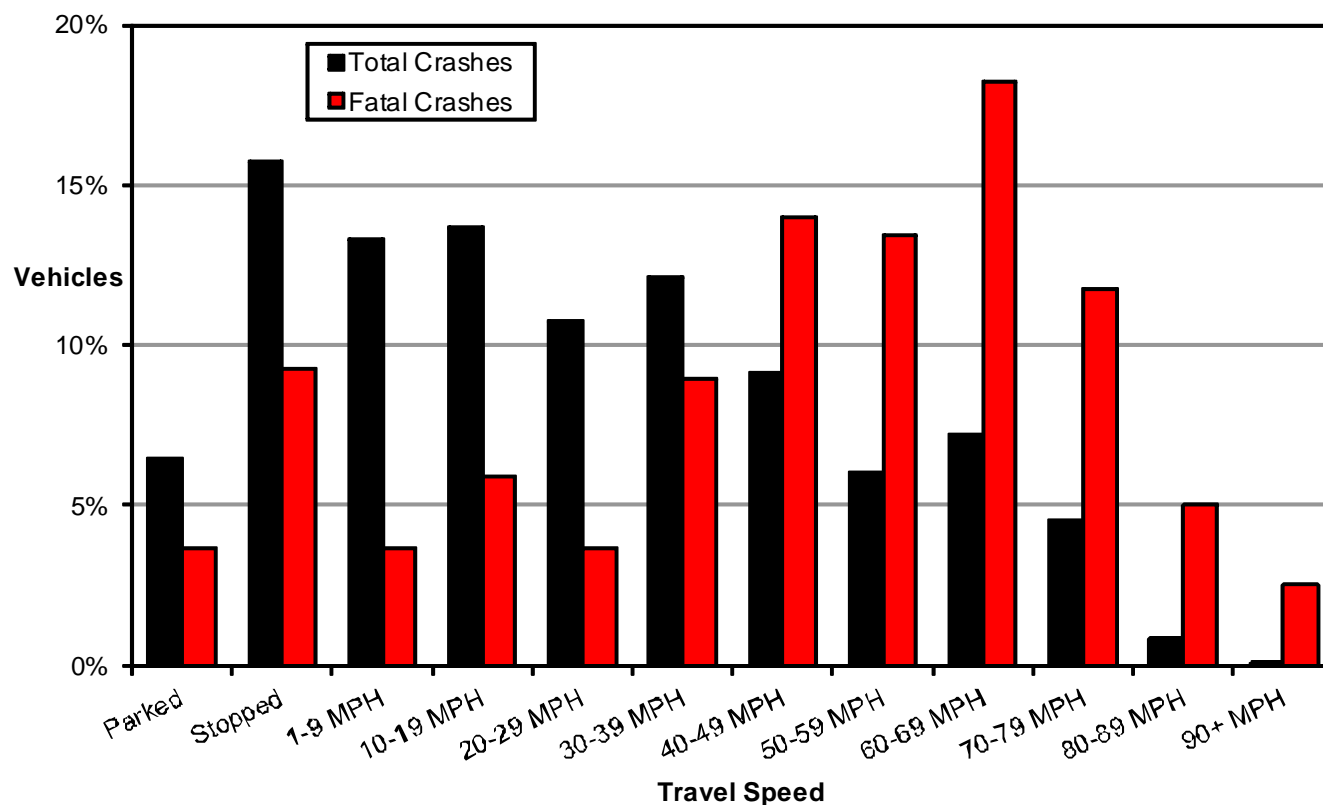


- The speed limit was 30-45 MPH for one-half (50% of known) of the total vehicles in crashes.
- Fatal crashes were more likely to occur with higher speed limits. The speed limit was 50 MPH or higher for over one-half (52% of known) of the vehicles in fatal crashes.
- Crashes where the speed limit was 80 MPH were overrepresented in fatal crashes. 80 MPH represented 2% (of known) of vehicles in total crashes and 10% (of known) of vehicles in fatal crashes.
- Crashes where the speed limit was 80 MPH were 5.2 times more likely to be fatal.
- Studies show that a 5% increase in average speed leads to a 10% increase in injury crashes and a 20% increase in fatal crashes. A 5% decrease in speed leads to a 10% decrease in injury crashes and a 20% decrease in fatal crashes.

Crash Conditions

Travel Speed (Utah 2016)

Vehicles								
Travel Speed	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Parked	3,725	4.7%	777	2.2%	9	2.2%	4,511	3.9%
Stopped	9,256	11.6%	5,461	15.1%	14	3.4%	14,731	12.7%
1-9 MPH	8,297	10.4%	2,876	8.0%	17	4.1%	11,190	9.6%
10-19 MPH	9,127	11.4%	3,682	10.2%	26	6.3%	12,835	11.0%
20-29 MPH	7,140	8.9%	3,074	8.5%	21	5.1%	10,235	8.8%
30-39 MPH	7,324	9.2%	3,966	11.0%	29	7.1%	11,319	9.7%
40-49 MPH	5,229	6.6%	3,153	8.7%	49	11.9%	8,431	7.2%
50-59 MPH	3,858	4.8%	1,776	4.9%	45	10.9%	5,679	4.9%
60-69 MPH	5,167	6.5%	1,885	5.2%	63	15.3%	7,115	6.1%
70-79 MPH	3,321	4.2%	1,338	3.7%	29	7.1%	4,688	4.0%
80-89 MPH	574	0.7%	321	0.9%	19	4.6%	914	0.8%
90+ MPH	37	0.0%	60	0.2%	11	2.7%	108	0.1%
Unknown	16,760	21.0%	7,757	21.5%	79	19.2%	24,596	21.1%
Total	79,815	100.0%	36,126	100.0%	411	100.0%	116,352	100.0%

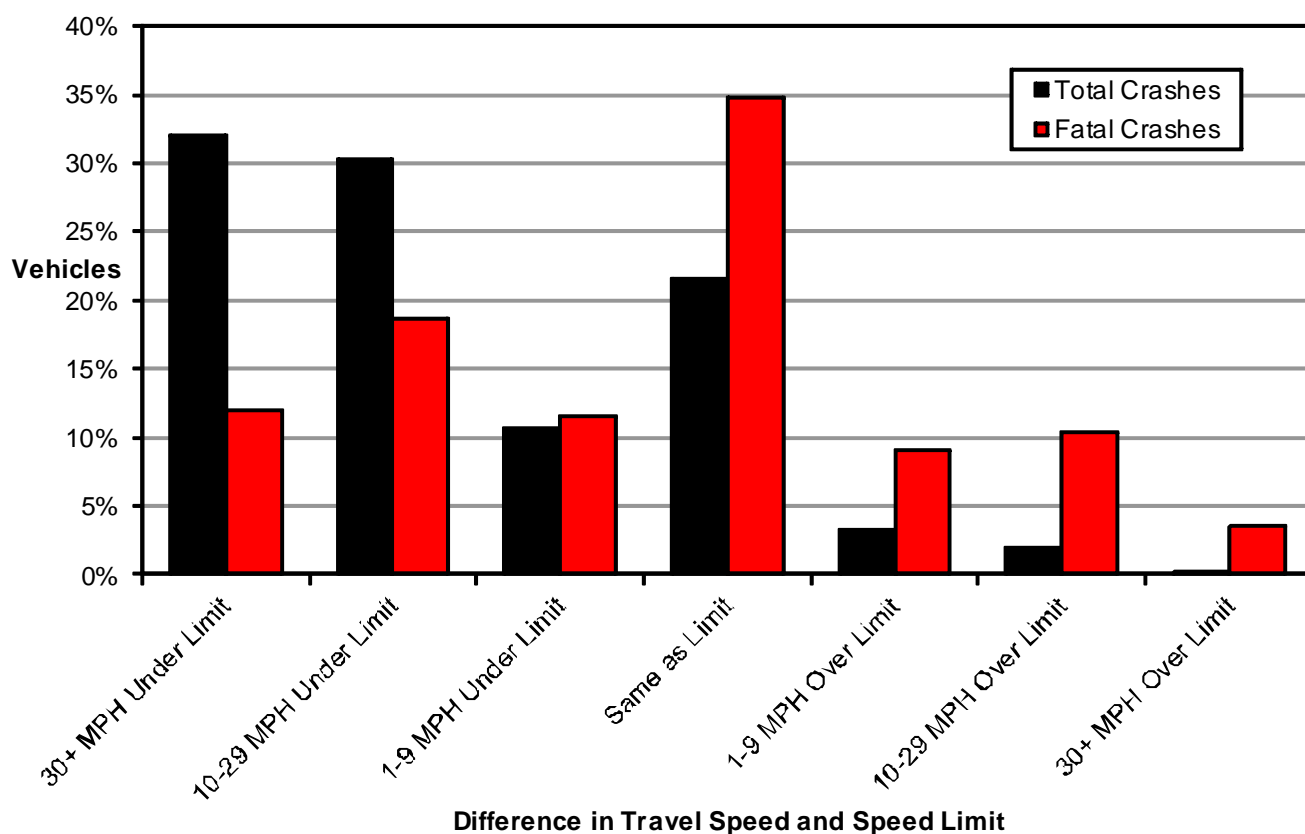


- One-half (50% of known) of vehicles in total crashes were traveling 1-39 MPH.
- Vehicles in fatal crashes were more likely to be traveling at higher speeds. 50% (of known) of vehicles in fatal crashes were traveling 50 MPH or higher.
- Vehicles traveling 50 MPH or higher were 4.0 times more likely to be in a fatal crash. Vehicles traveling 80 MPH or higher were 9.1 times more likely to be in a fatal crash. The higher the speed the greater the amount of energy that must be absorbed in a crash, hence there is more likelihood of serious injury and death.
- Drivers become increased risks to themselves and other people on the highway due to higher speeds.

Crash Conditions

Difference in Travel Speed and Speed Limit (Utah 2016)

Travel Speed vs. Speed Limit	Vehicles							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
40+ MPH Under Speed Limit	9,569	12.0%	4,955	13.7%	23	5.6%	14,547	12.5%
30-39 MPH Under Speed Limit	7,998	10.0%	3,834	10.6%	14	3.4%	11,846	10.2%
20-29 MPH Under Speed Limit	8,748	11.0%	3,465	9.6%	27	6.6%	12,240	10.5%
10-19 MPH Under Speed Limit	9,084	11.4%	3,662	10.1%	31	7.5%	12,777	11.0%
1-9 MPH Under Speed Limit	6,284	7.9%	2,497	6.9%	36	8.8%	8,817	7.6%
Same as Limit	11,708	14.7%	6,035	16.7%	108	26.3%	17,851	15.3%
1-9 MPH Over Speed Limit	1,710	2.1%	1,000	2.8%	28	6.8%	2,738	2.4%
10-19 MPH Over Speed Limit	688	0.9%	529	1.5%	18	4.4%	1,235	1.1%
20-29 MPH Over Speed Limit	165	0.2%	159	0.4%	14	3.4%	338	0.3%
30-39 MPH Over Speed Limit	35	0.0%	49	0.1%	6	1.5%	90	0.1%
40+ MPH Over Speed Limit	24	0.0%	50	0.1%	5	1.2%	79	0.1%
Unknown	23,802	29.8%	9,891	27.4%	101	24.6%	33,794	29.0%
Total	79,815	100.0%	36,126	100.0%	411	100.0%	116,352	100.0%



- For total crashes, 73% (of known) of vehicles were traveling under the speed limit, 22% (of known) were traveling the same as the speed limit, and 5% (of known) were traveling over the speed limit.
- For fatal crashes, 42% (of known) of vehicles were traveling under the speed limit, 35% (of known) were traveling the same as the speed limit, and 23% (of known) were traveling over the speed limit.
- Vehicles in fatal crashes were more likely to be exceeding the posted speed limit by greater amounts.
- Vehicles in crashes traveling over the posted speed limit were 5.2 times more likely to be in a fatal crash than vehicles traveling the speed limit or lower.

Crash Conditions

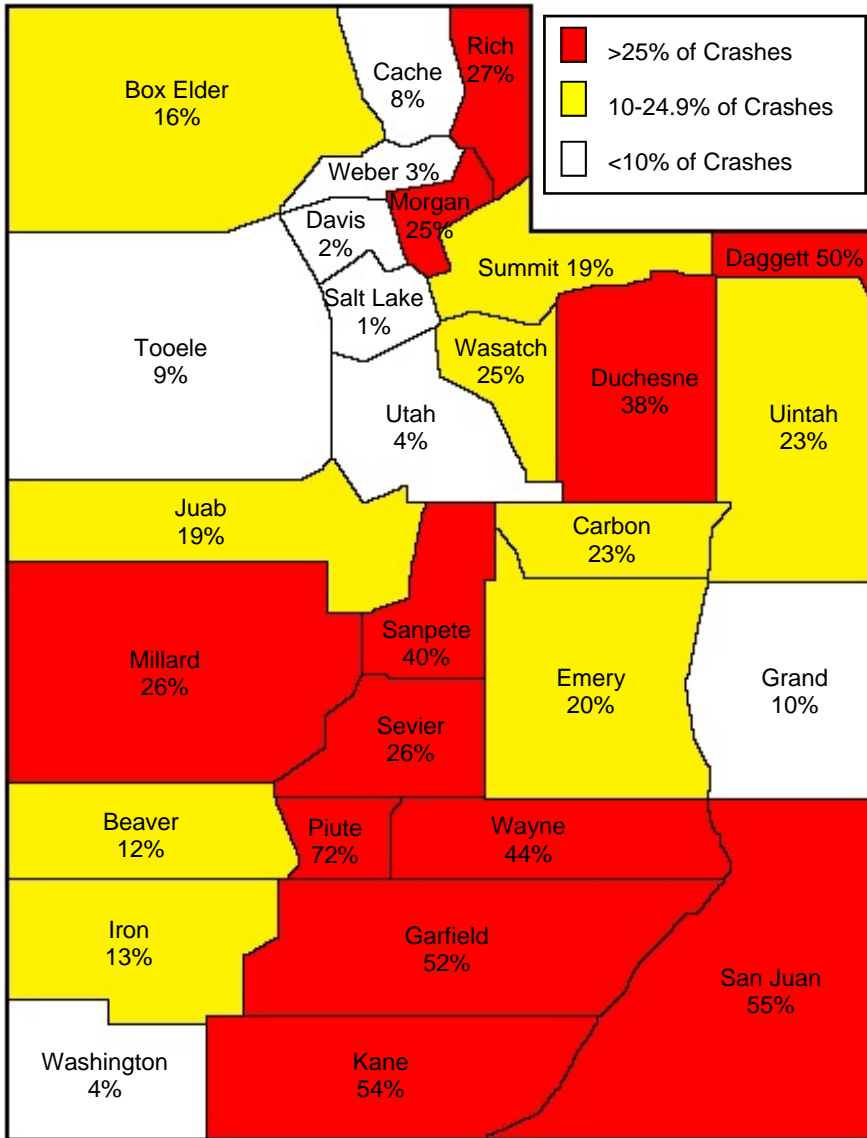
First Harmful Event (Utah 2016)

Crashes								
First Harmful Event	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Collision with Other Motor Vehicle	29,686	68.3%	13,016	69.4%	103	39.8%	42,805	68.5%
Collision with Animal	2,924	6.7%	239	1.3%	1	0.4%	3,164	5.1%
Collision with Parked Vehicle	2,035	4.7%	358	1.9%	4	1.5%	2,397	3.8%
Collision with Concrete Barrier	1,618	3.7%	618	3.3%	3	1.2%	2,239	3.6%
Collision with Post, Pole, or Support	1,366	3.1%	450	2.4%	11	4.2%	1,827	2.9%
Overturn/Rollover	558	1.3%	853	4.6%	46	17.8%	1,457	2.3%
Collision with Other Fixed Object	753	1.7%	210	1.1%	4	1.5%	967	1.5%
Collision with Pedestrian	10	0.0%	777	4.1%	38	14.7%	825	1.3%
Collision with Fence	636	1.5%	173	0.9%	8	3.1%	817	1.3%
Collision with Other Non-Fixed Object	555	1.3%	109	0.6%	2	0.8%	666	1.1%
Other Non-Collision	412	0.9%	226	1.2%	0	0.0%	638	1.0%
Collision with Bicyclist	27	0.1%	602	3.2%	5	1.9%	634	1.0%
Collision with Tree/Shrubbery	350	0.8%	205	1.1%	5	1.9%	560	0.9%
Collision with Embankment	330	0.8%	190	1.0%	12	4.6%	532	0.9%
Collision with Guardrail	285	0.7%	119	0.6%	4	1.5%	408	0.7%
Collision with Cable Barrier	338	0.8%	60	0.3%	1	0.4%	399	0.6%
Collision with Ditch	232	0.5%	128	0.7%	1	0.4%	361	0.6%
Collision with Vehicle Cargo/Part/Object set in Motion	246	0.6%	56	0.3%	1	0.4%	303	0.5%
Collision with Mailbox/Fire Hydrant	231	0.5%	59	0.3%	0	0.0%	290	0.5%
Collision with Thrown or Fallen Object	197	0.5%	23	0.1%	0	0.0%	220	0.4%
Cargo/Equipment Loss or Shift	184	0.4%	26	0.1%	0	0.0%	210	0.3%
Fire/Explosion	178	0.4%	6	0.0%	0	0.0%	184	0.3%
Fell/Jumped from Vehicle	10	0.0%	117	0.6%	3	1.2%	130	0.2%
Collision with Crash Cushion	59	0.1%	36	0.2%	1	0.4%	96	0.2%
Collision with Curb	69	0.2%	25	0.1%	2	0.8%	96	0.2%
Jackknife	63	0.1%	10	0.1%	1	0.4%	74	0.1%
Collision with Culvert	34	0.1%	17	0.1%	0	0.0%	51	0.1%
Collision with Bridge	26	0.1%	13	0.1%	2	0.8%	41	0.1%
Collision with Work Zone/Maintenance Equipment	25	0.1%	14	0.1%	0	0.0%	39	0.1%
Collision with Train	21	0.0%	11	0.1%	1	0.4%	33	0.1%
Immersion	7	0.0%	1	0.0%	0	0.0%	8	0.0%
Total	43,465	100.0%	18,747	100.0%	259	100.0%	62,471	100.0%

- For all crashes, the leading first harmful event was collision with other motor vehicle (69%).
- For total crashes, collision with animal (5%) and collision with parked vehicle (4%) were the next highest first harmful events.
- For fatal crashes, overturn/rollover (18%) and collision with pedestrian (15%) were the next highest first harmful events.
- Overturn/rollover was 5.6 times more likely to result in a death than other first harmful events.

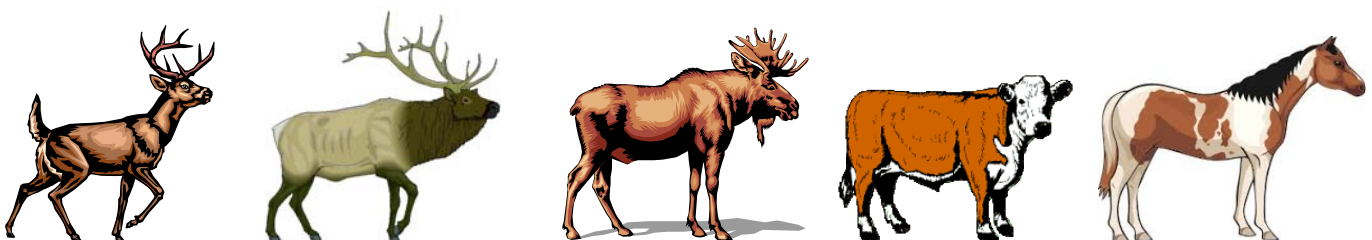
Animal-Related Crashes

Percent of Crashes Involving Animals by County (Utah 2016)



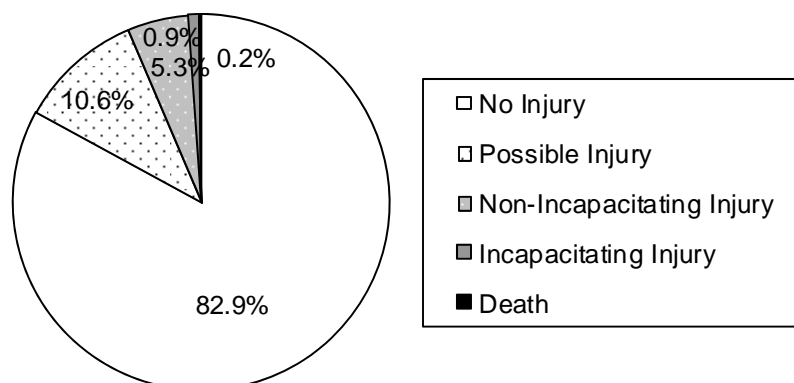
County	Total Crashes	Animal Crashes		
		Total #	Rate per 100 Million VMT	% With Animal
Piute	39	28	85.8	71.8%
San Juan	266	146	44.1	54.9%
Kane	208	113	68.0	54.3%
Garfield	230	119	91.4	51.7%
Daggett	14	7	20.2	50.0%
Wayne	64	28	51.2	43.8%
Sanpete	364	146	58.8	40.1%
Duchesne	302	116	35.4	38.4%
Rich	81	22	40.0	27.2%
Sevier	390	103	28.1	26.4%
Millard	434	113	20.0	26.0%
Morgan	166	42	28.2	25.3%
Wasatch	726	180	44.8	24.8%
Uintah	499	113	25.8	22.6%
Carbon	385	87	24.8	22.6%
Emery	256	51	13.1	19.9%
Juab	353	68	15.1	19.3%
Summit	1,193	223	26.0	18.7%
Box Elder	1,359	213	21.1	15.7%
Iron	951	124	14.9	13.0%
Beaver	251	29	9.6	11.6%
Grand	222	21	5.2	9.5%
Tooele	1,107	104	11.5	9.4%
Cache	2,064	174	17.5	8.4%
Washington	2,706	106	6.4	3.9%
Utah	9,365	346	7.3	3.7%
Weber	4,413	109	6.1	2.5%
Davis	5,776	123	4.2	2.1%
Salt Lake	28,287	289	2.9	1.0%
Statewide	62,471	3,343	10.9	5.4%

- There were 3,343 collisions involving animals, 2,835 (85%) involved hitting a wild animal, 364 (11%) involved hitting a domestic animal, and 144 (4%) involved an unharmed animal causing evasive action.
- Piute (72%), San Juan (55%), Kane (54%), Garfield (52%), and Daggett (50%) Counties had the highest percent of crashes involving an animal.
- Garfield (91.4), Piute (85.8), Kane (68.0), Sanpete (58.8), and Wayne (51.2) Counties had the highest rate per 100 million vehicle miles traveled of crashes involving an animal.
- Utah, Salt Lake, Summit, and Box Elder Counties had the highest amount of animal-related crashes.



Crash Conditions

Injury Severity (Utah 2016)



- Although many people were injured and killed in motor vehicle crashes, the majority (83%) of persons in crashes did not sustain a known injury at the crash scene. See Glossary in the Appendix for injury definitions.
- Persons in the same crash sustain different levels of injury. Many factors influence injury patterns including seat belt use, seating position, and vehicle safety equipment.

Person Placement (Utah 2016)

Persons								
Person Placement	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Driver	95,331	72.6%	18,124	67.8%	167	59.4%	113,622	71.7%
Passenger	35,961	27.4%	7,103	26.6%	70	24.9%	43,134	27.2%
Pedestrian	69	0.1%	898	3.4%	39	13.9%	1,006	0.6%
Bicyclist	37	0.0%	613	2.3%	5	1.8%	655	0.4%
Total	131,398	100.0%	26,738	100.0%	281	100.0%	158,417	100.0%

- While 99% of all people in total crashes were drivers or passengers, 16% of deaths were to pedestrians and bicyclists.

Gender of Persons in Crashes (Utah 2016)

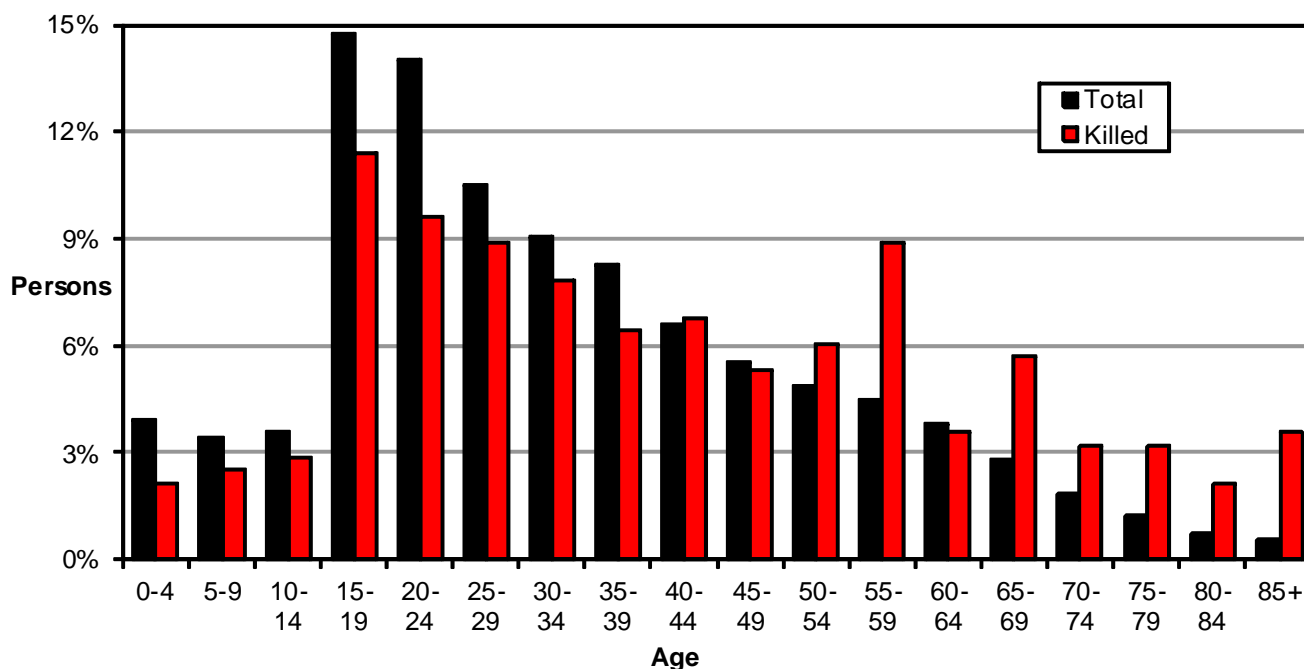
Persons								
Gender	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Male	71,219	54.2%	12,311	46.0%	195	69.4%	83,725	52.9%
Female	55,978	42.6%	14,217	53.2%	86	30.6%	70,281	44.4%
Unknown	4,201	3.2%	210	0.8%	0	0.0%	4,411	2.8%
Total	131,398	100.0%	26,738	100.0%	281	100.0%	158,417	100.0%

- Males comprised over half of all persons in crashes and over two-thirds of deaths, while females sustained more injuries than males.
- Males were 1.9 times more likely to die than females in a crash.

Crash Conditions

Age of Persons in Crashes (Utah 2016)

Age	Persons							
	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
0-4	5,471	4.2%	491	1.8%	6	2.1%	5,968	3.8%
5-9	4,473	3.4%	728	2.7%	7	2.5%	5,208	3.3%
10-14	4,359	3.3%	1,026	3.8%	8	2.8%	5,393	3.4%
15-19	18,857	14.4%	3,500	13.1%	32	11.4%	22,389	14.1%
20-24	17,639	13.4%	3,574	13.4%	27	9.6%	21,240	13.4%
25-29	13,070	9.9%	2,830	10.6%	25	8.9%	15,925	10.1%
30-34	11,203	8.5%	2,497	9.3%	22	7.8%	13,722	8.7%
35-39	10,247	7.8%	2,231	8.3%	18	6.4%	12,496	7.9%
40-44	8,193	6.2%	1,796	6.7%	19	6.8%	10,008	6.3%
45-49	6,784	5.2%	1,567	5.9%	15	5.3%	8,366	5.3%
50-54	5,915	4.5%	1,439	5.4%	17	6.0%	7,371	4.7%
55-59	5,407	4.1%	1,380	5.2%	25	8.9%	6,812	4.3%
60-64	4,644	3.5%	1,072	4.0%	10	3.6%	5,726	3.6%
65-69	3,429	2.6%	824	3.1%	16	5.7%	4,269	2.7%
70-74	2,268	1.7%	525	2.0%	9	3.2%	2,802	1.8%
75-79	1,463	1.1%	353	1.3%	9	3.2%	1,825	1.2%
80-84	886	0.7%	232	0.9%	6	2.1%	1,124	0.7%
85+	647	0.5%	172	0.6%	10	3.6%	829	0.5%
Unknown	6,443	4.9%	501	1.9%	0	0.0%	6,944	4.4%
Total	131,398	100.0%	26,738	100.0%	281	100.0%	158,417	100.0%



- The largest proportion of persons in crashes were aged 15-29 years (39% of known).
- The age groups with the highest number of persons killed were 15-29, and 55-59 years.
- The average age of a person in a crash was 33.2 years. The average age of a person killed was 41.0 years.
- While persons aged 65 years and older represented a small proportion of the persons in crashes (7% of known), they were 2.8 times more likely than all other age groups to die.

Crash Conditions

Persons in Crashes by County (Utah 2016)

County	Persons											
	Non-Injured			Injured			Killed			Total		
	#	Rate per 100 Million VMT	Rate per 10,000 Pop.	#	Rate per 100 Million VMT	Rate per 10,000 Pop.	#	Rate per 100 Million VMT	Rate per 10,000 Pop.	#	Rate per 100 Million VMT	Rate per 10,000 Pop.
Salt Lake	61,667	626.4	549.9	12,137	123.3	108.2	69	0.70	0.62	73,873	750.4	658.8
Weber	9,372	521.9	378.6	2,213	123.2	89.4	19	1.06	0.77	11,604	646.1	468.7
Utah	19,882	421.1	335.7	4,236	89.7	71.5	31	0.66	0.52	24,149	511.4	407.7
Davis	12,604	426.1	368.2	2,489	84.1	72.7	27	0.91	0.79	15,120	511.1	441.7
Cache	4,096	411.2	333.7	698	70.1	56.9	12	1.20	0.98	4,806	482.5	391.5
Washington	6,128	368.9	382.4	1,210	72.8	75.5	15	0.90	0.94	7,353	442.7	458.9
Wasatch	1,373	341.7	449.8	231	57.5	75.7	7	1.74	2.29	1,611	401.0	527.7
Box Elder	2,846	281.9	535.6	565	56.0	106.3	10	0.99	1.88	3,421	338.8	643.8
Garfield	318	244.4	637.8	84	64.5	168.5	5	3.84	10.03	407	312.8	816.3
Summit	2,224	259.6	551.8	398	46.5	98.7	4	0.47	0.99	2,626	306.5	651.5
Tooele	2,082	230.7	321.1	501	55.5	77.3	20	2.22	3.08	2,603	288.4	401.5
Sanpete	513	206.7	174.4	157	63.3	53.4	4	1.61	1.36	674	271.6	229.2
Iron	1,850	221.7	370.5	356	42.7	71.3	4	0.48	0.80	2,210	264.8	442.6
Uintah	950	216.8	261.2	147	33.5	40.4	3	0.68	0.82	1,100	251.0	302.4
Carbon	665	189.7	326.0	131	37.4	64.2	3	0.86	1.47	799	227.9	391.7
Rich	92	167.4	396.7	30	54.6	129.4	0	0.00	0.00	122	222.0	526.1
Sevier	608	166.0	285.9	175	47.8	82.3	9	2.46	4.23	792	216.2	372.4
Beaver	505	167.2	781.4	124	41.1	191.9	0	0.00	0.00	629	208.3	973.2
Kane	257	154.6	350.4	63	37.9	85.9	2	1.20	2.73	322	193.7	439.1
Piute	47	144.1	320.6	15	46.0	102.3	1	3.07	6.82	63	193.1	429.7
Duchesne	506	154.5	248.8	99	30.2	48.7	1	0.31	0.49	606	185.0	298.0
Juab	651	144.9	591.3	162	36.1	147.1	5	1.11	4.54	818	182.1	743.0
Wayne	67	122.5	248.0	32	58.5	118.4	0	0.00	0.00	99	181.0	366.4
Morgan	218	146.4	190.6	38	25.5	33.2	1	0.67	0.87	257	172.6	224.7
Millard	762	134.9	600.3	198	35.1	156.0	5	0.89	3.94	965	170.9	760.2
Emery	389	99.8	380.8	112	28.7	109.6	9	2.31	8.81	510	130.9	499.2
San Juan	358	108.0	211.9	51	15.4	30.2	10	3.02	5.92	419	126.4	248.0
Grand	344	84.8	359.1	86	21.2	89.8	4	0.99	4.18	434	106.9	453.1
Daggett	24	69.2	219.2	0	0.0	0.0	1	2.88	9.13	25	72.1	228.3
Statewide	131,398	426.9	430.6	26,738	86.9	87.6	281	0.91	0.92	158,417	514.7	519.2

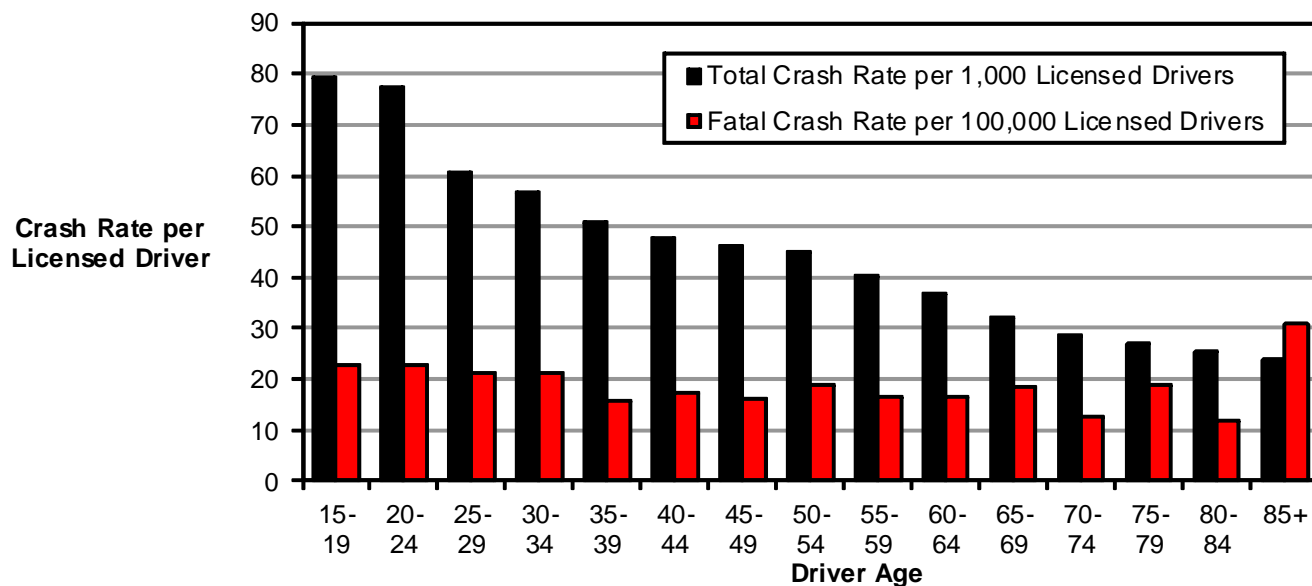
- Two different rates are given in the above table. One rate is based on vehicle miles traveled in the county and the other based on the county population.
- Rate per 100 million vehicle miles traveled:
 - Salt Lake (750), Weber (646), Utah (511), and Davis (511) counties had the highest rates of total persons in crashes per 100 million vehicle miles traveled.
 - Garfield (3.8), Piute (3.1), and San Juan (3.0) counties had the highest rates of persons killed per 100 million vehicle miles traveled.
- Rate per 10,000 population:
 - Beaver (973), Garfield (816), Millard (760), and Juab (743) counties had the highest rates of total persons in crashes per 10,000 population.
 - Garfield (10.0), Daggett (9.1), Emery (8.8), and Piute (6.8) counties had the highest rates of persons killed per 10,000 population.

Crash Conditions

Driver Age (Utah 2016)

Drivers												
Age	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers
<15	31	0.0%	n/a	43	0.1%	n/a	3	0.7%	n/a	77	0.1%	n/a
15-19	10,255	13.2%	55.8	4,296	12.0%	23.4	42	10.4%	0.229	14,593	12.8%	79.5
20-24	11,422	14.7%	52.9	5,282	14.8%	24.4	49	12.2%	0.227	16,753	14.7%	77.5
25-29	8,896	11.5%	41.2	4,140	11.6%	19.2	46	11.4%	0.213	13,082	11.5%	60.5
30-34	7,805	10.1%	38.1	3,766	10.6%	18.4	43	10.7%	0.210	11,614	10.2%	56.7
35-39	7,179	9.3%	34.0	3,548	10.0%	16.8	33	8.2%	0.156	10,760	9.5%	50.9
40-44	5,831	7.5%	32.2	2,782	7.8%	15.4	31	7.7%	0.171	8,644	7.6%	47.8
45-49	4,855	6.3%	31.4	2,240	6.3%	14.5	25	6.2%	0.162	7,120	6.3%	46.0
50-54	4,204	5.4%	30.3	2,018	5.7%	14.6	26	6.5%	0.187	6,248	5.5%	45.1
55-59	3,849	5.0%	26.7	1,931	5.4%	13.4	24	6.0%	0.166	5,804	5.1%	40.3
60-64	3,259	4.2%	24.6	1,575	4.4%	11.9	22	5.5%	0.166	4,856	4.3%	36.6
65-69	2,287	2.9%	21.2	1,147	3.2%	10.6	20	5.0%	0.186	3,454	3.0%	32.0
70-74	1,503	1.9%	18.8	777	2.2%	9.7	10	2.5%	0.125	2,290	2.0%	28.6
75-79	927	1.2%	17.6	486	1.4%	9.2	10	2.5%	0.190	1,423	1.3%	27.0
80-84	573	0.7%	16.9	291	0.8%	8.6	4	1.0%	0.118	868	0.8%	25.6
85+	393	0.5%	15.1	222	0.6%	8.5	8	2.0%	0.308	623	0.5%	24.0
Unknown	4,293	5.5%	n/a	1,109	3.1%	n/a	6	1.5%	n/a	5,408	4.8%	n/a
Total	77,562	100.0%	37.2	35,653	100.0%	17.1	402	100.0%	0.193	113,617	100.0%	54.5

Crash Rate of Licensed Drivers by Age (Utah 2016)



- Drivers aged 15-24 years had the highest rates per licensed driver of total crashes.
- Drivers aged 85+ and 15-24 years had the highest rates per driver of fatal crashes.
- Drivers aged 85+ years had the lowest rate per licensed driver of total crashes. Drivers aged 80-84 years had the lowest rate per licensed driver of fatal crashes.
- The average age of a driver was 37.2 years. The average age of a driver in a fatal crash was 40.6 years.

Crash Conditions

Driver Gender (Utah 2016)

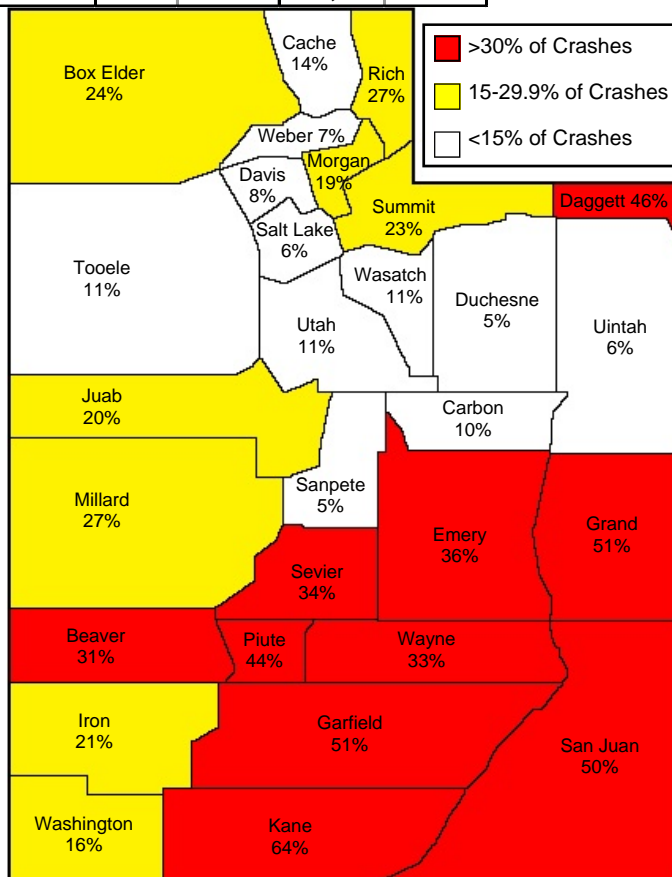
Drivers												
Gender	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers
Male	43,784	56.5%	41.7	19,068	53.5%	18.1	292	72.6%	0.28	63,144	55.6%	60.1
Female	30,354	39.1%	29.4	15,811	44.3%	15.3	105	26.1%	0.10	46,270	40.7%	44.8
Unknown	3,424	4.4%	n/a	774	2.2%	n/a	5	1.2%	n/a	4,203	3.7%	n/a
Total	77,562	100.0%	37.2	35,653	100.0%	17.1	402	100.0%	0.19	113,617	100.0%	54.5

- Males represented 56% of all drivers in a crash and 73% of drivers in fatal crashes.
- Based off of licensed drivers, females are better drivers than males. Male drivers had higher rates of total crashes and fatal crashes. Among all licensed drivers, male drivers were 1.4 times more likely to be in a crash than female. Among drivers in crashes, males were 2.0 times more likely to be in a fatal crash than females.

Out-of-State Drivers (Utah 2016)

Drivers								
License State	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Utah	64,941	83.7%	30,683	86.1%	342	85.1%	95,966	84.5%
Out-Of-State	7,260	9.4%	3,146	8.8%	50	12.4%	10,456	9.2%
Unknown/None	5,361	6.9%	1,824	5.1%	10	2.5%	7,195	6.3%
Total	77,562	100.0%	35,653	100.0%	402	100.0%	113,617	100.0%

- Although out-of-state licensed drivers represented 9% of all drivers in crashes, they represented 12% of drivers in fatal crashes.
- There were several counties that had a disproportionate amount of out-of-state drivers in crashes. Most notably in Kane (64%), Grand (51%), Garfield (51%), and San Juan (50%) Counties where over half of the drivers in crashes were out-of-state drivers. These drivers may place an extra burden on the residents and medical services in these counties.



Crash Conditions

Violations (Utah 2016)

Violations	Drivers							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Following Too Close	5,588	21.1%	2,758	19.1%	2	3.4%	8,348	20.4%
Failure to Yield Right of Way	2,539	9.6%	1,861	12.9%	10	16.9%	4,410	10.8%
Improper Turn	2,513	9.5%	1,345	9.3%	1	1.7%	3,859	9.4%
Improper Lane Change/Travel	2,602	9.8%	965	6.7%	0	0.0%	3,567	8.7%
Improper Lookout	2,215	8.4%	1,021	7.1%	0	0.0%	3,236	7.9%
Negligent Collision	1,887	7.1%	862	6.0%	0	0.0%	2,749	6.7%
License Violation	1,553	5.9%	1,030	7.1%	4	6.8%	2,587	6.3%
Speed	1,511	5.7%	735	5.1%	0	0.0%	2,246	5.5%
Driving Under the Influence	963	3.6%	739	5.1%	8	13.6%	1,710	4.2%
Failure to Stop at Red Light	701	2.6%	782	5.4%	1	1.7%	1,484	3.6%
Insurance Violation	746	2.8%	504	3.5%	0	0.0%	1,250	3.0%
Hit and Run	784	3.0%	229	1.6%	2	3.4%	1,015	2.5%
Failure to Obey Traffic Control Device	255	1.0%	244	1.7%	3	5.1%	502	1.2%
Registration Violation	323	1.2%	170	1.2%	1	1.7%	494	1.2%
Unknown Violation	278	1.1%	175	1.2%	2	3.4%	455	1.1%
Failure to Stop at Stop Sign	202	0.8%	180	1.2%	0	0.0%	382	0.9%
Equipment Violation	278	1.1%	90	0.6%	0	0.0%	368	0.9%
Improper Backing	275	1.0%	18	0.1%	0	0.0%	293	0.7%
Alcohol/Drug Violation, Other than DUI	151	0.6%	132	0.9%	6	10.2%	289	0.7%
Careless Driving	159	0.6%	91	0.6%	0	0.0%	250	0.6%
Failure to Maintain Control	147	0.6%	94	0.6%	0	0.0%	241	0.6%
Improper Start	155	0.6%	57	0.4%	0	0.0%	212	0.5%
Improper Passing	152	0.6%	34	0.2%	0	0.0%	186	0.5%
Reckless Driving	87	0.3%	60	0.4%	3	5.1%	150	0.4%
Wrong Side of Road/Wrong Way	76	0.3%	65	0.4%	0	0.0%	141	0.3%
Other Non-Moving Violation	44	0.2%	27	0.2%	2	3.4%	73	0.2%
Texting	41	0.2%	31	0.2%	0	0.0%	72	0.2%
Slow Down/Move Over Emergency Vehicle	44	0.2%	25	0.2%	0	0.0%	69	0.2%
Improper Signal	42	0.2%	25	0.2%	0	0.0%	67	0.2%
Seat Belt/Child Restraint/Helmet	15	0.1%	38	0.3%	1	1.7%	54	0.1%
Driving While Drowsy/Fatigue/Ill	32	0.1%	21	0.1%	0	0.0%	53	0.1%
Improper Stop	38	0.1%	15	0.1%	0	0.0%	53	0.1%
Distracted Driving	24	0.1%	20	0.1%	0	0.0%	44	0.1%
Other Moving Violation	23	0.1%	11	0.1%	1	1.7%	35	0.1%
Evading/Fleeing	14	0.1%	10	0.1%	0	0.0%	24	0.1%
Improper Parking	15	0.1%	5	0.0%	0	0.0%	20	0.0%
Vehicle Homicide	0	0.0%	0	0.0%	12	20.3%	12	0.0%
Total	26,472	100.0%	14,469	100.0%	59	100.0%	41,000	100.0%

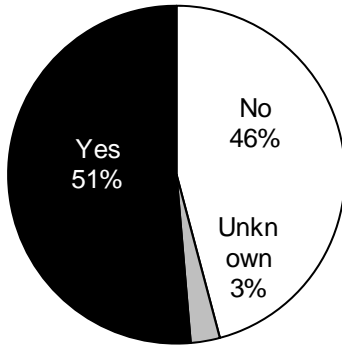
- There were 41,000 charges from citations issued at the scene of the crash. The most common violations were for following too close (20%), failure to yield right of way (11%), improper turn (9%), and improper lane change/travel (9%).
- The leading violations in fatal crashes were vehicle homicide (20%), failure to yield (17%), and driving under the influence (14%).
- A citation was issued in 60% of the crashes.

Crash Conditions

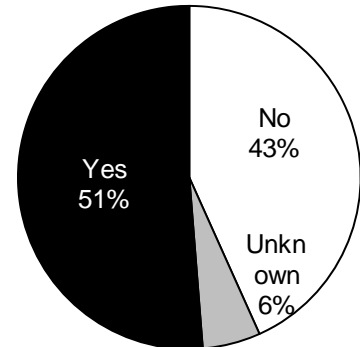
Drivers with Contributing Factors (Utah 2016)

Driver/Vehicle with a Contributing Factor(s)	Drivers/Vehicles							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Yes	40,689	51.0%	18,843	52.2%	206	51.2%	59,738	51.3%
No	36,813	46.1%	16,361	45.3%	174	43.3%	53,348	45.9%
Unknown	2,313	2.9%	922	2.6%	22	5.5%	3,257	2.8%
Total	79,815	100.0%	36,126	100.0%	402	100.0%	116,343	100.0%

Total Crashes



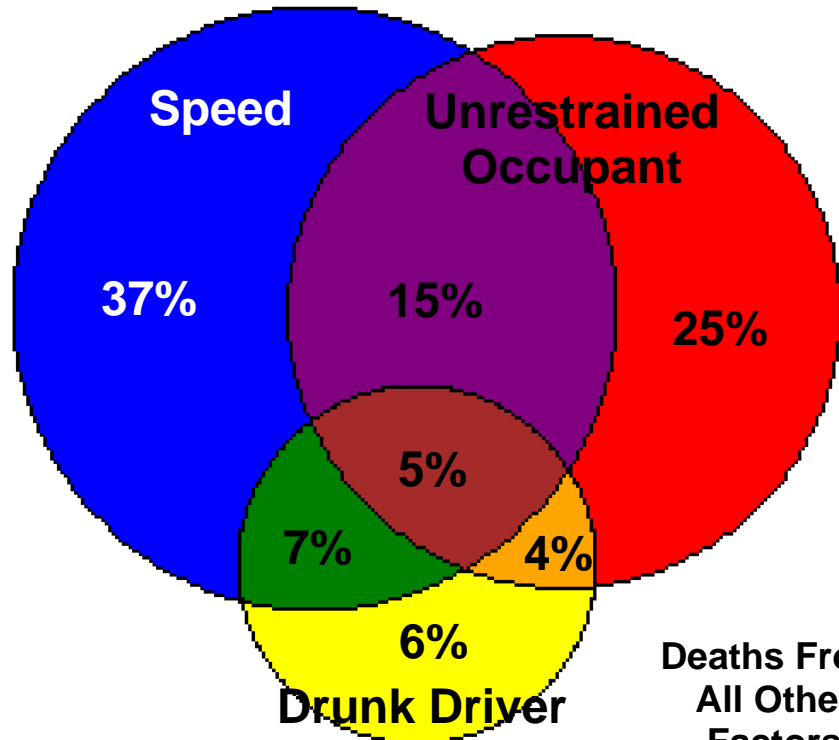
Fatal Crashes



- Some form of poor driver performance is present in the majority of crashes.
- 51.3% of drivers had a contributing factor in total crashes.
- 51.2% of drivers had a contributing factor in fatal crashes.

Overlap of Selected Contributing Factors in Deaths (Utah 2016)

- This Venn Diagram shows the overlap of just three causes of death — speed, unrestrained occupant, and drunk driver. Many other factors also contribute to deaths and crashes.
- 162 of the 281 (58%) deaths had a contributing factor of speed, unrestrained occupant, or drunk driver.
- Of these deaths, 37% only had the contributing factor of speed, 25% only had the contributing factor of unrestrained occupant, and 6% only had the contributing factor of drunk driver.
- Among the deaths that had two of these factors, 15% had the factors of speed and unrestrained occupant, 7% had the factors of speed and drunk driver, and 4% had the factors of unrestrained occupant and drunk driver.
- 5% of these deaths had all three contributing factors.

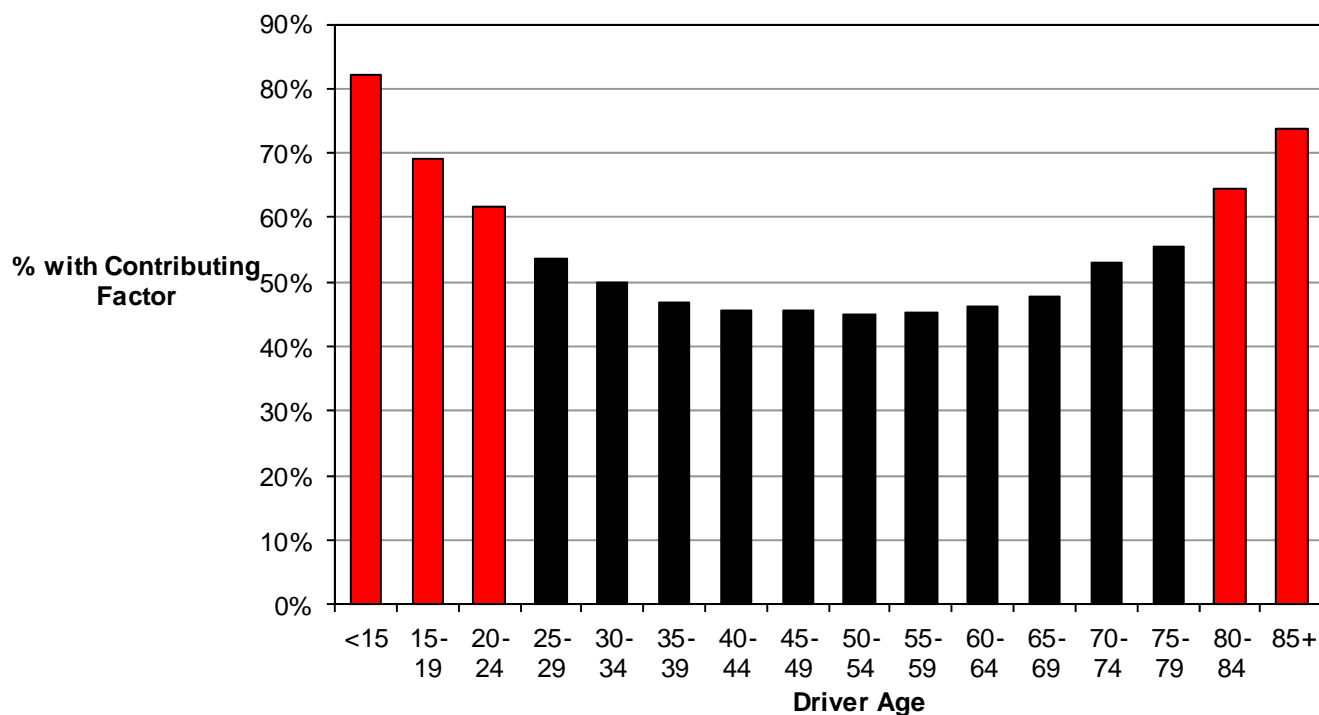


Deaths From All Other Factors - 42%

Crash Conditions

Drivers with a Contributing Factor by Age (Utah 2016)

Driver Age	Drivers with a Contributing Factor											
	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	No	Yes	%	No	Yes	%	No	Yes	%	No	Yes	%
	#	#	%	#	#	%	#	#	%	#	#	%
<15	5	23	82.1%	7	35	83.3%	1	2	66.7%	13	60	82.2%
15-19	3,211	6,836	68.0%	1,201	3,017	71.5%	15	26	63.4%	4,427	9,879	69.1%
20-24	4,309	6,867	61.4%	1,951	3,210	62.2%	18	29	61.7%	6,278	10,106	61.7%
25-29	4,093	4,571	52.8%	1,804	2,233	55.3%	16	30	65.2%	5,913	6,834	53.6%
30-34	3,834	3,781	49.7%	1,827	1,850	50.3%	17	23	57.5%	5,678	5,654	49.9%
35-39	3,749	3,261	46.5%	1,831	1,627	47.1%	9	20	69.0%	5,589	4,908	46.8%
40-44	3,053	2,623	46.2%	1,512	1,209	44.4%	14	15	51.7%	4,579	3,847	45.7%
45-49	2,603	2,106	44.7%	1,161	1,027	46.9%	12	13	52.0%	3,776	3,146	45.4%
50-54	2,238	1,842	45.1%	1,090	870	44.4%	13	11	45.8%	3,341	2,723	44.9%
55-59	2,040	1,710	45.6%	1,042	840	44.6%	11	9	45.0%	3,093	2,559	45.3%
60-64	1,709	1,470	46.2%	826	708	46.2%	13	8	38.1%	2,548	2,186	46.2%
65-69	1,175	1,052	47.2%	570	545	48.9%	9	11	55.0%	1,754	1,608	47.8%
70-74	703	759	51.9%	347	417	54.6%	3	7	70.0%	1,053	1,183	52.9%
75-79	398	507	56.0%	217	257	54.2%	3	7	70.0%	618	771	55.5%
80-84	202	364	64.3%	102	185	64.5%	0	4	100.0%	304	553	64.5%
85+	107	276	72.1%	50	167	77.0%	2	6	75.0%	159	449	73.8%
Unknown	1,188	2,584	68.5%	356	640	64.3%	1	4	80.0%	1,545	3,228	67.6%
Total	34,617	40,632	54.0%	15,894	18,837	54.2%	157	225	58.9%	50,668	59,694	54.1%



- This information shows that younger and older drivers were the most likely to have a contributing factor in a crash.
- Drivers aged <25 and 80+ had the highest percent of drivers with a contributing factor in total crashes.
- Drivers aged 30-69 had the lowest percent of drivers with a contributing factor in total crashes.

Crash Conditions

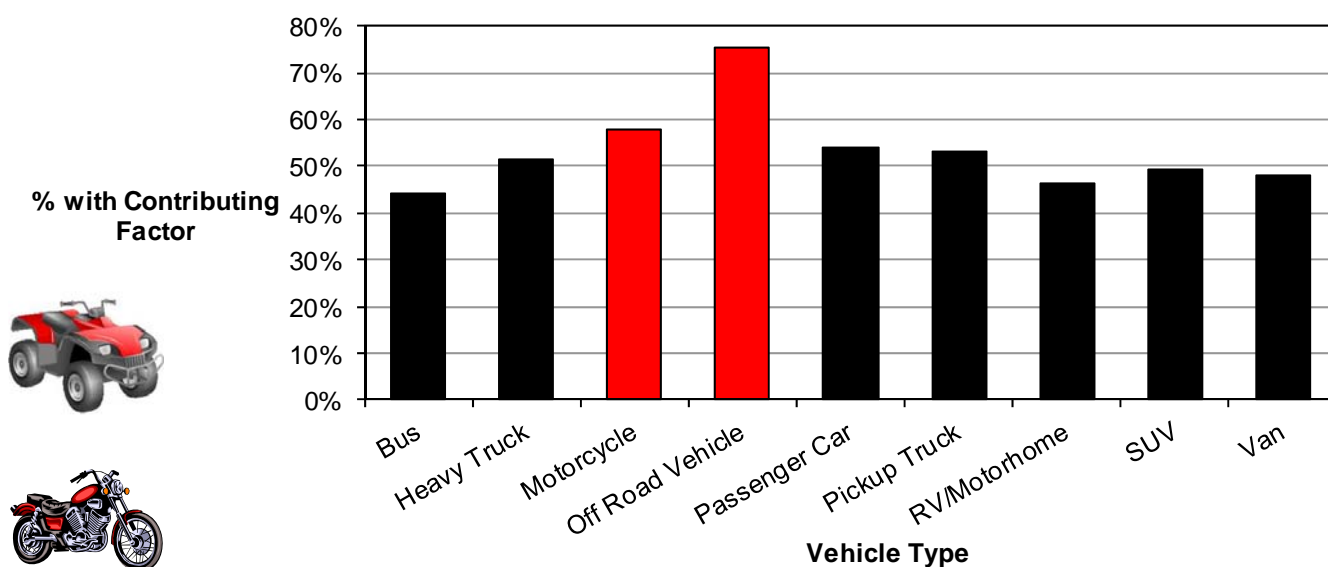
Drivers with a Contributing Factor by Gender (Utah 2016)

Drivers with a Contributing Factor												
Driver Gender	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	No	Yes		No	Yes		No	Yes		No	Yes	
	#	#	%	#	#	%	#	#	%	#	#	%
Male	19,579	23,132	54.2%	8,347	10,267	55.2%	110	166	60.1%	28,036	33,565	54.5%
Female	14,124	15,448	52.2%	7,315	8,111	52.6%	47	55	53.9%	21,486	23,614	52.4%
Unknown	914	2,052	69.2%	232	459	66.4%	0	4	100.0%	1,146	2,515	68.7%
Total	34,617	40,632	54.0%	15,894	18,837	54.2%	157	225	58.9%	50,668	59,694	54.1%

- Male drivers were slightly more likely to have a contributing factor in a crash than female drivers.

Drivers with a Contributing Factor by Vehicle Type (Utah 2016)

Drivers/Vehicles with a Contributing Factor												
Vehicle Type	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	No	Yes		No	Yes		No	Yes		No	Yes	
	#	#	%	#	#	%	#	#	%	#	#	%
Off Road Vehicle	12	21	63.6%	30	106	77.9%	1	6	85.7%	43	133	75.6%
Motorcycle	74	86	53.8%	390	551	58.6%	13	23	63.9%	477	660	58.0%
Passenger Car	18,318	21,401	53.9%	8,390	10,076	54.6%	49	96	66.2%	26,757	31,573	54.1%
Pickup Truck	5,932	6,638	52.8%	2,246	2,653	54.2%	34	39	53.4%	8,212	9,330	53.2%
Heavy Truck	1,364	1,465	51.8%	366	385	51.3%	15	9	37.5%	1,745	1,859	51.6%
SUV	8,549	8,194	48.9%	3,805	3,925	50.8%	38	38	50.0%	12,392	12,157	49.5%
Van	2,095	1,917	47.8%	1,036	979	48.6%	6	7	53.8%	3,137	2,903	48.1%
RV/Motorhome	46	44	48.9%	15	9	37.5%	0	0	n/a	61	53	46.5%
Bus	179	156	46.6%	48	23	32.4%	0	1	100.0%	227	180	44.2%
Other	14	28	66.7%	5	8	61.5%	1	1	50.0%	20	37	64.9%
Unknown	230	739	76.3%	30	128	81.0%	0	5	100.0%	260	872	77.0%
Total	36,813	40,689	52.5%	16,361	18,843	53.5%	157	225	58.9%	53,331	59,757	52.8%



- Drivers of off road vehicles and motorcycles were the most likely to have a contributing factor in total crashes.
- Drivers of buses and RV/motorhomes were the least likely to have a contributing factor in total crashes.

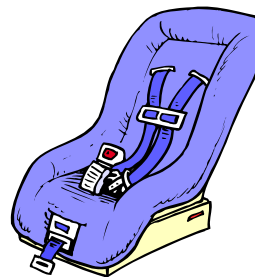
Crash Conditions

Contributing Factors (Utah 2016)

Contributing Factors	Drivers/Vehicles							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Followed Too Closely	10,344	16.7%	4,952	16.3%	9	2.4%	15,305	16.5%
Failed to Yield Right of Way	7,576	12.2%	4,704	15.5%	43	11.5%	12,323	13.3%
Speed Too Fast	6,310	10.2%	2,750	9.1%	67	17.9%	9,127	9.8%
Failed to Keep in Proper Lane	5,480	8.8%	2,365	7.8%	6	1.6%	7,851	8.5%
Driver Distraction	3,566	5.8%	2,225	7.3%	27	7.2%	5,818	6.3%
Other Improper Driving	3,219	5.2%	1,622	5.3%	3	0.8%	4,844	5.2%
Vision Obscured by Weather Condition	2,852	4.6%	1,071	3.5%	13	3.5%	3,936	4.2%
Disregard Traffic Signal/Sign	1,779	2.9%	1,760	5.8%	17	4.5%	3,556	3.8%
Improper Turn	2,292	3.7%	883	2.9%	6	1.6%	3,181	3.4%
Hit and Run	2,269	3.7%	555	1.8%	6	1.6%	2,830	3.1%
Improper Lane Change	2,261	3.6%	437	1.4%	6	1.6%	2,704	2.9%
Ran Off Road	1,431	2.3%	870	2.9%	33	8.8%	2,334	2.5%
Driving Under the Influence	1,227	2.0%	956	3.1%	30	8.0%	2,213	2.4%
Improper Backing	1,784	2.9%	120	0.4%	1	0.3%	1,905	2.1%
Overcorrected	823	1.3%	587	1.9%	30	8.0%	1,440	1.6%
Swerved or Evasive Action	927	1.5%	500	1.6%	1	0.3%	1,428	1.5%
Improper Parking/Stopping	942	1.5%	331	1.1%	0	0.0%	1,273	1.4%
Driver Asleep/Fatigue	746	1.2%	512	1.7%	14	3.7%	1,272	1.4%
Vision Obscured by Moving Vehicle	719	1.2%	344	1.1%	4	1.1%	1,067	1.2%
Vehicle Other Defective Condition	671	1.1%	263	0.9%	3	0.8%	937	1.0%
Reckless/Aggressive Driving	446	0.7%	291	1.0%	16	4.3%	753	0.8%
Vehicle Tires	544	0.9%	189	0.6%	7	1.9%	740	0.8%
Vehicle Brakes	446	0.7%	245	0.8%	2	0.5%	693	0.7%
Vision Obscured by Glare	377	0.6%	244	0.8%	0	0.0%	621	0.7%
Vision Obscured by Parked Vehicle	460	0.7%	151	0.5%	0	0.0%	611	0.7%
Driver Illness/Medical	243	0.4%	339	1.1%	6	1.6%	588	0.6%
Vision Obscured by Other	342	0.6%	184	0.6%	2	0.5%	528	0.6%
Improper Passing	423	0.7%	86	0.3%	2	0.5%	511	0.6%
Driver Condition Other	269	0.4%	193	0.6%	0	0.0%	462	0.5%
Driver Emotional Prior to Crash	226	0.4%	179	0.6%	6	1.6%	411	0.4%
Wrong Side/Wrong Way	206	0.3%	165	0.5%	11	2.9%	382	0.4%
Vehicle Cargo	265	0.4%	35	0.1%	0	0.0%	300	0.3%
Disregard Road Markings	129	0.2%	61	0.2%	0	0.0%	190	0.2%
Vision Obscured by Physical Obstruction	107	0.2%	80	0.3%	0	0.0%	187	0.2%
Windshield or Other Window Obscured	133	0.2%	48	0.2%	3	0.8%	184	0.2%
Vision Obscured by Vegetation	90	0.1%	38	0.1%	0	0.0%	128	0.1%
Improper Signal	68	0.1%	24	0.1%	0	0.0%	92	0.1%
Total	61,992	100.0%	30,359	100.0%	374	100.0%	92,725	100.0%

- Some form of poor driver performance is present in the majority of crashes. The leading contributing factors for all crashes were followed too closely (17%), failed to yield right of way (13%), speed too fast (10%), and failed to keep in proper lane (9%).
- The leading contributing factors in fatal crashes were speed too fast (18%) and failed to yield (12%).
- The contributing factors that contributed more to injury crashes than non-injury crashes were: failure to yield right of way, disregard traffic signal/sign, driver distraction, and driving under the influence.

Occupant Protection



Section 2: Occupant Protection

2

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Children and Restraint Use

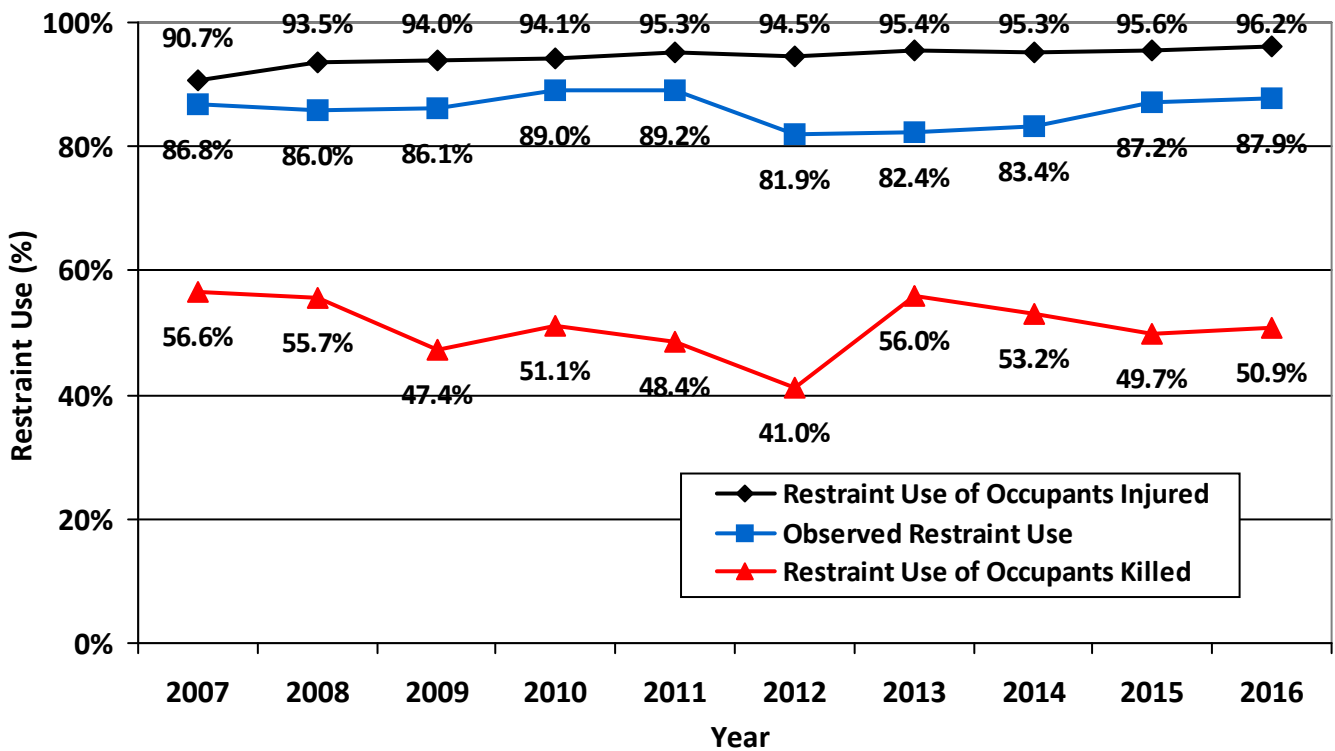
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6

Trends

Restraint Use of Occupants In Crashes (Utah 2007-2016)

Persons												
Year	Non-Injured			Injured			Killed			Total		
	Unres	Restrained	%	Unres	Restrained	%	Unres	Restrained	%	Unrestrained	Restrained	%
	#	#	%	#	#	%	#	#	%	#	#	%
2007	3,529	109,245	96.9%	2,116	20,541	90.7%	82	107	56.6%	5,727	129,893	95.8%
2008	1,369	97,907	98.6%	1,273	18,400	93.5%	78	98	55.7%	2,720	116,405	97.7%
2009	2,273	91,303	97.6%	1,120	17,627	94.0%	91	82	47.4%	3,484	109,012	96.9%
2010	1,896	89,245	97.9%	1,048	16,599	94.1%	86	90	51.1%	3,030	105,934	97.2%
2011	1,801	91,793	98.1%	845	17,249	95.3%	82	77	48.4%	2,728	109,119	97.6%
2012	2,115	89,699	97.7%	990	16,996	94.5%	79	55	41.0%	3,184	106,750	97.1%
2013	1,579	93,675	98.3%	827	17,290	95.4%	59	75	56.0%	2,465	111,040	97.8%
2014	1,806	95,482	98.1%	894	18,261	95.3%	72	82	53.2%	2,772	113,825	97.6%
2015	1,705	109,360	98.5%	936	20,113	95.6%	87	86	49.7%	2,728	129,559	97.9%
2016	1,530	116,526	98.7%	846	21,508	96.2%	80	83	50.9%	2,456	138,117	98.3%
Total	19,603	984,235	98.0%	10,895	184,584	94.4%	796	835	51.2%	31,294	1,169,654	97.4%



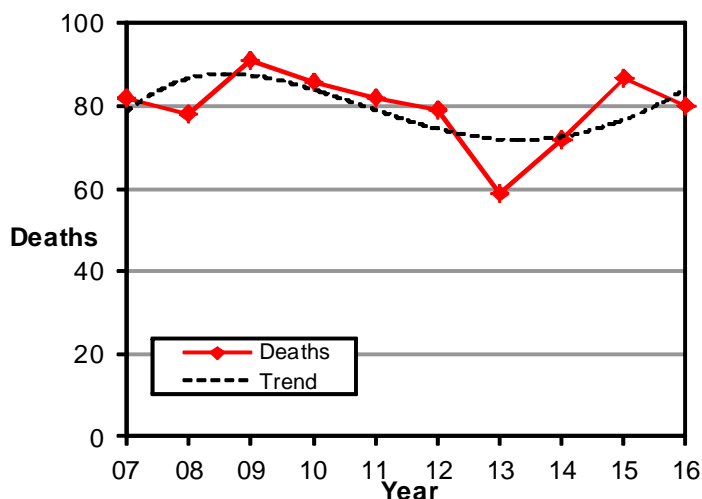
- The 2016 restraint use of people in crashes increased to 98.3% from 95.8% in 2007.
- Restraint use among occupants injured increased from 90.7% in 2007 to 96.2% in 2016.
- Restraint use among occupants killed decreased from 56.6% in 2007 to 50.9% in 2016.

Note: Restraint use is reported for occupants in a passenger car, light truck, van, SUV, or heavy truck. Occupants are considered "Restrained" if they were reported as using a shoulder/lap belt, lap belt, shoulder belt, or a child safety seat at the scene of the crash. It is estimated that seat belts can reduce the risk of death and serious injury by about 50%.

Trends

Unrestrained Occupant Deaths (Utah 2007-2016)

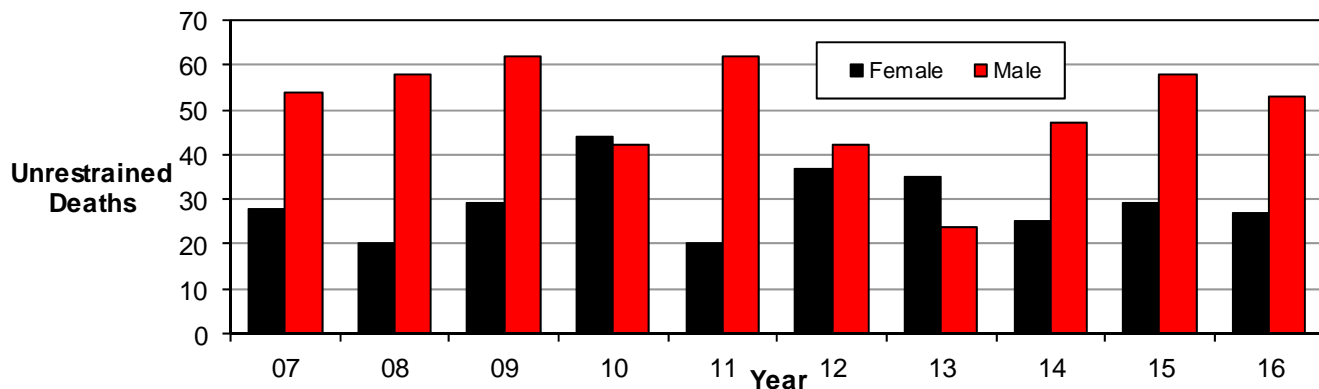
Year	Deaths		
	All #	Unrestrained Occupants #	%
	2007	299	82
2008	276	78	28.3%
2009	244	91	37.3%
2010	253	86	34.0%
2011	243	82	33.7%
2012	217	79	36.4%
2013	220	59	26.8%
2014	256	72	28.1%
2015	278	87	31.3%
2016	281	80	28.5%
Total	2,567	796	31.0%



- Over the past 10 years, 31.0% of deaths have been to unrestrained occupants.
- On average, 80 people die a year in Utah who are unrestrained.
- The percentage of deaths to unrestrained occupants had a high of 37.3% in 2009 and a low of 26.8% in 2013.

Restraint Use by Gender of Crash Occupant Deaths (Utah 2007-2016)

Gender	Occupants Killed																Total #	Total %						
	Unrestrained										Restrained													
	07	08	09	10	11	12	13	14	15	16	07	08	09	10	11	12			13	14	15	16		
Female	28	20	29	44	20	37	35	25	29	27	294	45.5%	42	42	35	40	32	26	29	37	30	39	352	54.5%
Male	54	58	62	42	62	42	24	47	58	53	502	51.0%	65	56	47	50	45	29	46	45	56	44	483	49.0%
Total	82	78	91	86	82	79	59	72	87	80	796	48.8%	107	98	82	90	77	55	75	82	86	83	835	51.2%

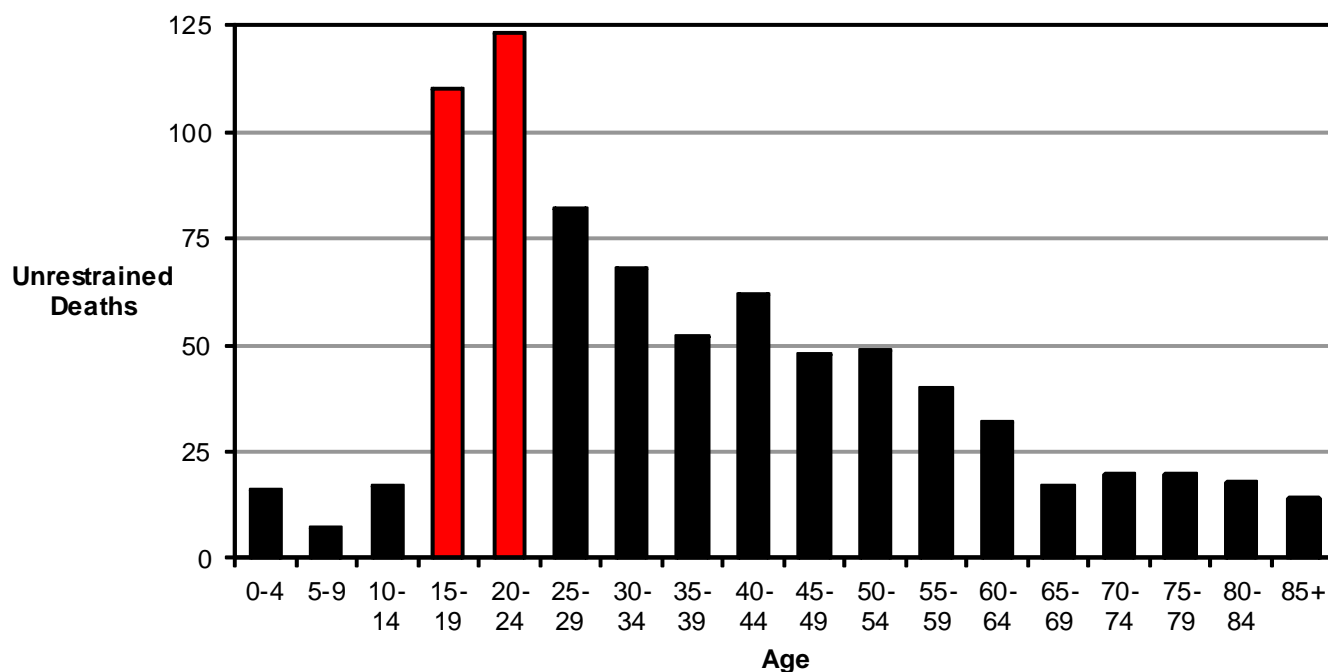


- Over the last 10 years, restraint use of female (54.5%) occupants killed was higher than males (49.0%).
- The number of female occupants killed who were unrestrained averages 29 deaths a year over the last 10 years with a high of 44 in 2010 and a low of 20 in 2008 and 2011.
- The number of male occupants killed who were unrestrained averages 50 deaths a year over the last 10 years with a high of 62 in 2009 and 2011 and a low of 24 in 2013.

Trends

Fatal Restraint Use by Age (Utah 2007-2016)

Age	Unrestrained												Restrained													
												Total #	Total %												Total #	Total %
	07	08	09	10	11	12	13	14	15	16			07	08	09	10	11	12	13	14	15	16				
0-4	1	2	2	1	4	0	1	1	2	2	16	37.2%	5	1	2	4	7	3	2	2	0	1	27	62.8%		
5-9	2	1	2	0	0	0	0	0	1	1	7	29.2%	4	4	2	2	0	2	0	1	2	0	17	70.8%		
10-14	1	4	5	1	1	1	1	0	1	2	17	56.7%	3	1	2	3	0	0	0	3	1	0	13	43.3%		
15-19	17	8	14	13	11	7	8	11	10	11	110	54.7%	14	13	12	6	4	7	3	12	6	14	91	45.3%		
20-24	18	13	15	10	11	10	12	9	14	11	123	60.3%	10	10	12	9	6	6	4	7	9	8	81	39.7%		
25-29	6	7	4	12	12	13	4	5	12	7	82	56.9%	9	11	3	5	6	4	4	4	6	10	62	43.1%		
30-34	5	11	8	7	8	7	3	7	6	6	68	50.7%	10	7	5	4	7	4	7	9	7	6	66	49.3%		
35-39	4	4	3	11	6	7	2	5	5	5	52	51.5%	7	8	4	4	3	1	5	5	7	5	49	48.5%		
40-44	7	8	9	4	5	9	5	4	6	5	62	60.2%	5	3	6	4	4	4	5	5	3	2	41	39.8%		
45-49	4	4	8	4	5	4	2	4	8	5	48	54.5%	4	8	5	4	2	4	2	3	5	3	40	45.5%		
50-54	4	6	5	4	1	8	5	9	4	3	49	45.0%	8	8	5	8	6	3	6	4	7	5	60	55.0%		
55-59	4	3	4	4	4	3	4	6	3	5	40	43.0%	5	4	5	5	4	1	9	6	6	8	53	57.0%		
60-64	2	1	3	2	6	3	4	4	2	5	32	40.0%	7	3	5	3	7	8	4	4	4	3	48	60.0%		
65-69	1	2	3	5	3	0	0	0	3	0	17	28.8%	3	5	3	5	7	1	6	4	5	3	42	71.2%		
70-74	0	1	1	1	2	2	3	2	3	5	20	36.4%	3	4	1	7	3	1	7	1	7	1	35	63.6%		
75-79	1	1	2	4	1	2	1	2	1	5	20	36.4%	1	2	4	9	2	3	1	5	4	4	35	63.6%		
80-84	1	1	2	1	1	1	3	3	4	1	18	33.3%	4	5	5	3	2	1	6	3	3	4	36	66.7%		
85+	3	1	1	2	1	2	1	0	2	1	14	26.4%	5	1	1	5	7	2	4	4	4	6	39	73.6%		
Unknown	1	0	0	0	0	0	0	0	0	0	1	100.0%	0	0	0	0	0	0	0	0	0	0	0	0.0%		
Total	82	78	91	86	82	79	59	72	87	80	796	48.8%	107	98	82	90	77	55	75	82	86	83	835	51.2%		

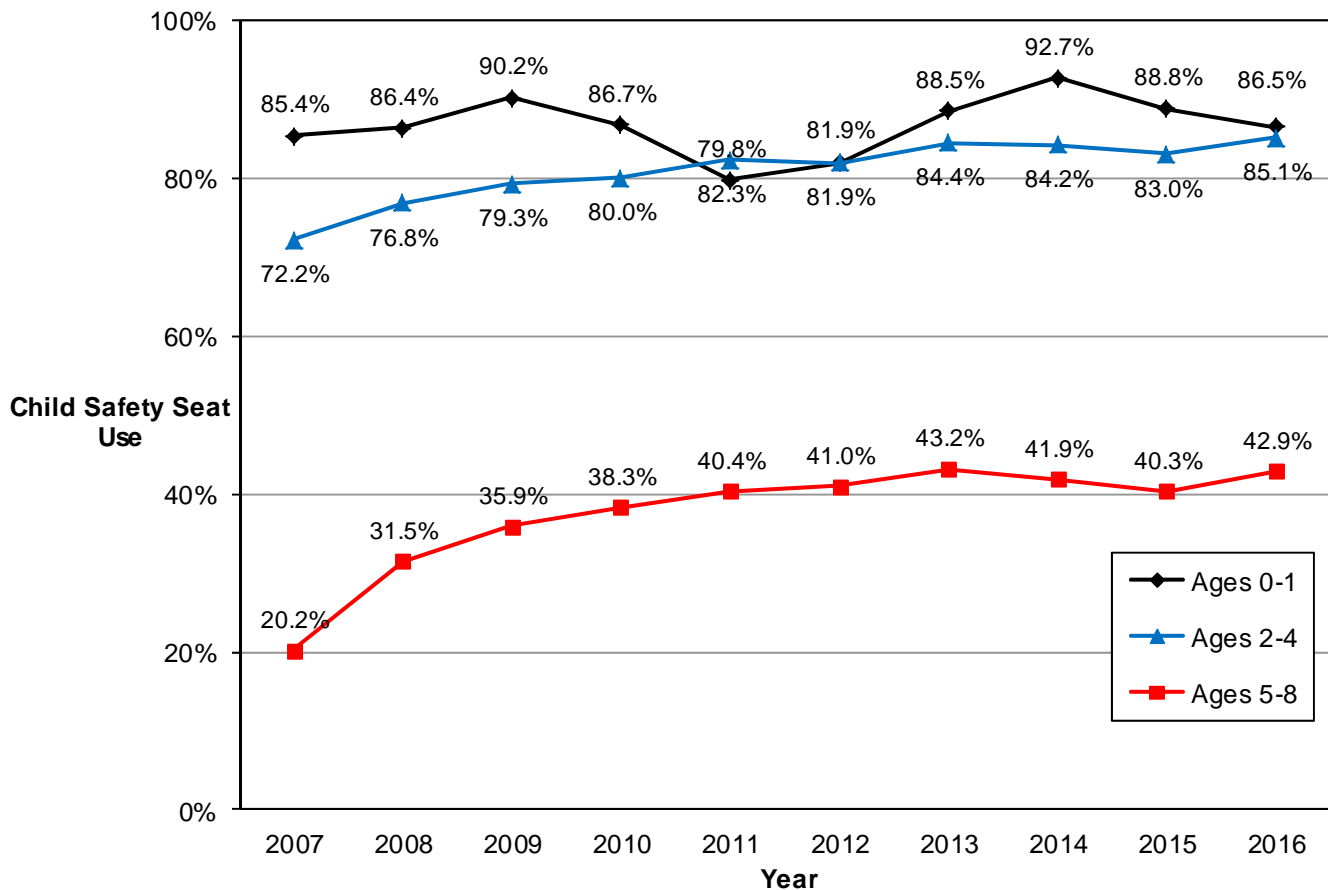


- Over the last 10 years, the highest number of unrestrained deaths occurred to the 20-24, 15-19, and 25-29 year age groups.
- The highest percent of restraint use among occupants killed occurred among the ages of 65+ and 0-9 years.
- The lowest percent of restraint use among occupants killed occurred among the ages of 10-49 years.

Trends

Child Safety Seat Use by Children Age 0 to 8 Years (Utah 2007-2016)

Child Occupants												
Year	Ages 0-1			Ages 2-4			Ages 5-8			Total		
	No CSS	Child Safety Seat	%	No CSS	Child Safety Seat	%	No CSS	Child Safety Seat	%	No CSS	Child Safety Seat	%
	#	#	%	#	#	%	#	#	%	#	#	%
2007	367	2,151	85.4%	961	2,495	72.2%	2,864	727	20.2%	4,192	5,373	56.2%
2008	286	1,822	86.4%	694	2,301	76.8%	2,125	978	31.5%	3,105	5,101	62.2%
2009	194	1,791	90.2%	606	2,326	79.3%	2,006	1,122	35.9%	2,806	5,239	65.1%
2010	261	1,703	86.7%	598	2,389	80.0%	1,833	1,139	38.3%	2,692	5,231	66.0%
2011	425	1,682	79.8%	520	2,414	82.3%	1,753	1,188	40.4%	2,698	5,284	66.2%
2012	363	1,644	81.9%	486	2,206	81.9%	1,824	1,265	41.0%	2,673	5,115	65.7%
2013	218	1,679	88.5%	412	2,229	84.4%	1,750	1,332	43.2%	2,380	5,240	68.8%
2014	149	1,885	92.7%	434	2,313	84.2%	1,917	1,384	41.9%	2,500	5,582	69.1%
2015	250	1,984	88.8%	524	2,565	83.0%	2,244	1,517	40.3%	3,018	6,066	66.8%
2016	330	2,107	86.5%	482	2,751	85.1%	2,183	1,637	42.9%	2,995	6,495	68.4%
Total	2,843	18,448	86.6%	5,717	23,989	80.8%	20,499	12,289	37.5%	29,059	54,726	65.3%

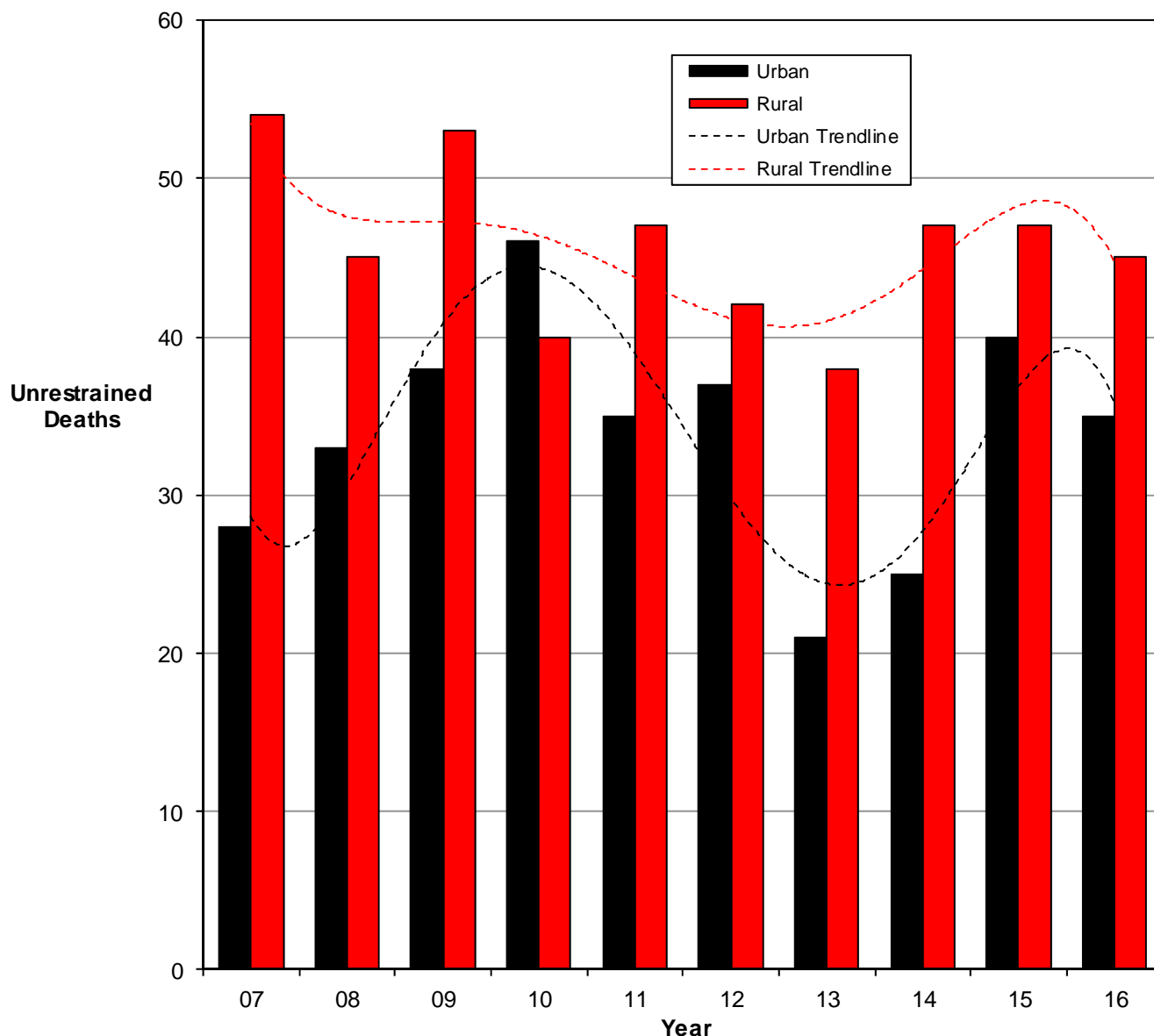


- The ten year trend shows an increase of child safety seat (CSS) use in crashes for ages 0-8 years.
- Ages 5-8 years showed the biggest gain in CSS use, increasing from 20.2% in 2007 to 42.9% in 2016.

Trends

Fatal Restraint Use by Rural/Urban Location (Utah 2007-2016)

Occupants Killed																								
Location	Unrestrained											Restrained												
	07	08	09	10	11	12	13	14	15	16	Total #	Total %	07	08	09	10	11	12	13	14	15	16	Total #	Total %
Rural	54	45	53	40	47	42	38	47	46	45	457	57.3%	52	48	46	39	40	21	31	28	36	341	42.7%	
Urban	28	33	38	46	35	37	21	25	41	35	339	45.2%	55	50	36	51	37	34	44	54	50	411	54.8%	
Total	82	78	91	86	82	79	59	72	87	80	796	51.4%	107	98	82	90	77	55	75	82	86	0	752	48.6%

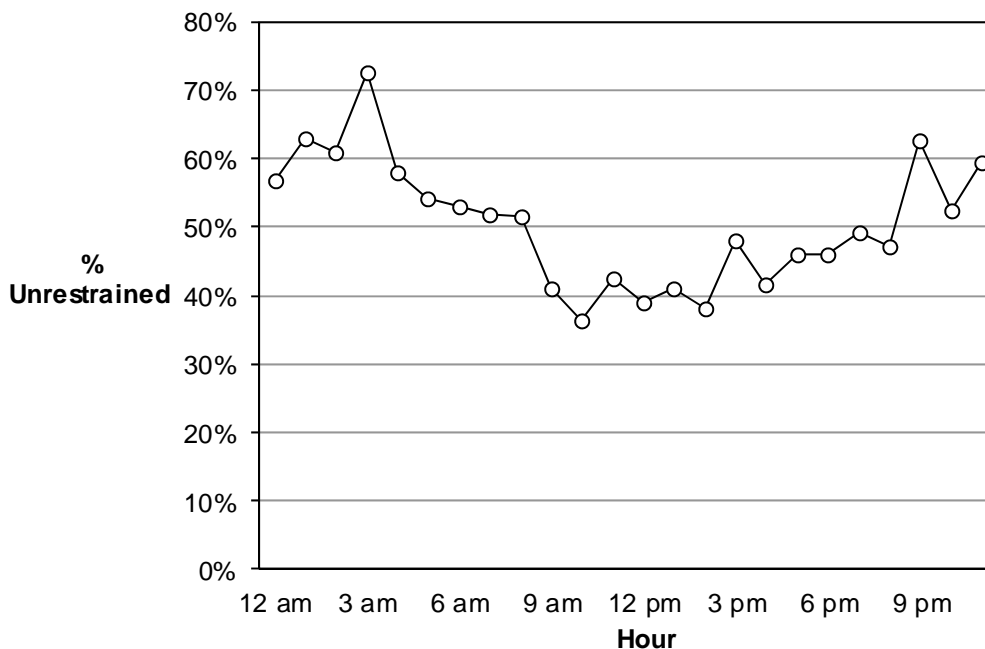


- Over the last 10 years, restraint use of urban (54.8%) occupants killed was higher than rural (42.7%).
- The number of rural occupants killed who were unrestrained averages 46 deaths a year over the last 10 years with a high of 54 in 2007 and a low of 38 in 2013.
- The number of urban occupants killed who were unrestrained averages 34 deaths a year over the last 10 years with a high of 46 in 2010 and a low of 21 in 2013.

Trends

Fatal Restraint Use by Hour (Utah 2007-2016)

Hour	Unrestrained											Total #		Total %		Restrained											Total #		Total %	
	07	08	09	10	11	12	13	14	15	16			07	08	09	10	11	12	13	14	15	16								
Midnight	3	2	10	2	4	2	2	2	1	1	29	56.9%	3	3	6	1	0	0	2	1	3	3	22	43.1%						
1 a.m.	3	4	5	1	3	3	2	4	3	1	29	63.0%	4	5	0	1	0	0	0	1	2	4	17	37.0%						
2 a.m.	4	6	3	2	2	4	0	2	3	2	28	60.9%	4	1	1	5	1	0	3	0	1	2	18	39.1%						
3 a.m.	5	1	3	4	5	2	0	2	4	6	32	72.7%	4	0	0	0	2	1	0	1	1	3	12	27.3%						
4 a.m.	1	1	8	2	1	1	4	5	0	2	25	58.1%	2	2	3	1	2	0	0	4	4	0	18	41.9%						
5 a.m.	4	4	1	3	2	4	4	1	5	5	33	54.1%	2	2	3	2	5	1	3	2	5	3	28	45.9%						
6 a.m.	2	6	2	2	2	3	3	2	4	1	27	52.9%	3	3	2	4	2	3	1	5	1	0	24	47.1%						
7 a.m.	3	7	3	8	3	3	3	0	5	4	39	52.0%	6	7	7	4	2	0	0	3	5	2	36	48.0%						
8 a.m.	4	1	4	4	3	3	2	5	2	6	34	51.5%	7	1	2	5	1	1	4	8	2	1	32	48.5%						
9 a.m.	1	3	0	2	6	1	2	1	4	3	23	41.1%	6	7	4	7	1	2	3	3	0	0	33	58.9%						
10 a.m.	2	0	4	2	5	3	5	2	1	1	25	36.2%	2	6	8	4	7	3	3	3	6	2	44	63.8%						
11 a.m.	2	4	3	6	1	2	2	2	3	3	28	42.4%	3	9	5	2	3	2	3	4	3	4	38	57.6%						
Noon	2	5	1	3	3	4	3	3	1	2	27	39.1%	6	4	3	7	4	3	2	3	3	7	42	60.9%						
1 p.m.	7	2	4	9	7	1	2	1	2	8	43	41.0%	6	4	4	4	8	4	11	9	1	11	62	59.0%						
2 p.m.	4	2	1	5	4	1	2	4	7	4	34	38.2%	3	4	3	5	7	10	5	5	9	4	55	61.8%						
3 p.m.	1	3	9	6	3	7	6	2	6	5	48	48.0%	11	5	8	5	3	2	6	7	4	1	52	52.0%						
4 p.m.	2	6	4	6	3	4	2	5	5	5	42	41.6%	7	5	4	5	8	7	7	5	7	4	59	58.4%						
5 p.m.	6	4	7	1	4	11	4	2	5	6	50	45.9%	11	4	7	8	3	3	6	4	8	5	59	54.1%						
6 p.m.	4	1	2	6	5	4	2	8	9	1	42	46.2%	3	8	3	6	7	2	3	3	8	6	49	53.8%						
7 p.m.	7	2	3	4	3	3	1	2	2	7	34	49.3%	3	4	3	3	2	1	5	3	2	9	35	50.7%						
8 p.m.	3	6	6	1	4	3	2	4	2	2	33	47.1%	4	4	1	5	4	5	4	1	5	4	37	52.9%						
9 p.m.	4	6	6	3	5	1	1	2	3	1	32	62.7%	1	4	2	1	2	1	2	4	1	1	19	37.3%						
10 p.m.	1	0	1	3	2	4	1	4	4	1	21	52.5%	4	2	3	0	1	3	1	2	1	2	19	47.5%						
11 p.m.	6	1	1	1	2	5	4	6	6	3	35	59.3%	2	4	0	4	2	1	1	1	4	5	24	40.7%						
Total	81	77	91	86	82	79	59	71	87	80	793	48.7%	107	98	82	89	77	55	75	82	86	83	834	51.3%						

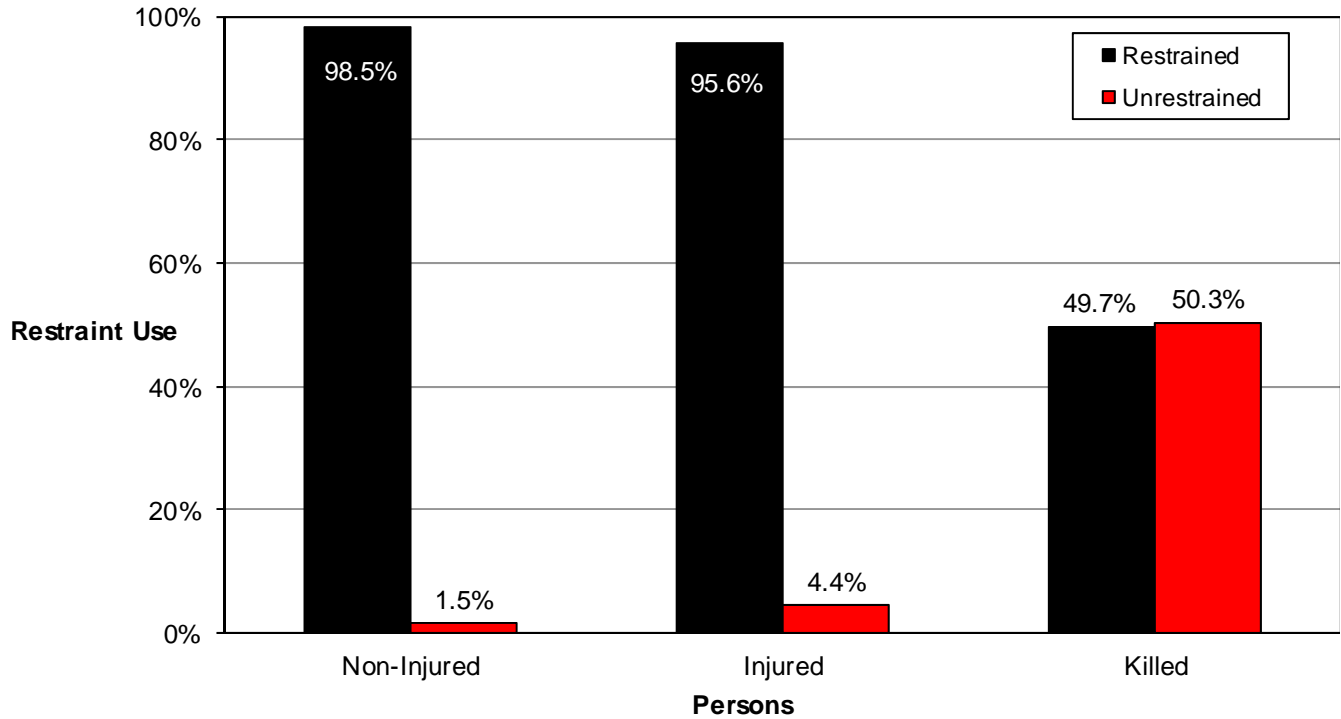


- Over the last 10 years, the highest number of unrestrained deaths occurred during the 3:00-6:59 p.m. hours.
- The highest percent of restraint use among occupants killed occurred during the 9 a.m. to 2:59 p.m. hours.
- The lowest percent of restraint use among occupants killed occurred during the 1:00-3:59 a.m. and 9 p.m. hours.

Vehicle Occupants

Restraint Use by Injury Severity (Utah 2016)

Persons								
Restraint Use	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Restrained	116,526	98.7%	21,508	96.2%	83	50.9%	138,117	98.3%
Unrestrained	1,530	1.3%	846	3.8%	80	49.1%	2,456	1.7%
Total	118,056	100.0%	22,354	100.0%	163	100.0%	140,573	100.0%



- 98% of persons who survived a crash reported being restrained compared to half of the persons killed.
- Unrestrained injured crash occupants were 24 times more likely to be killed than restrained injured crash occupants.

Restraint Use by Gender of Crash Occupants (Utah 2016)

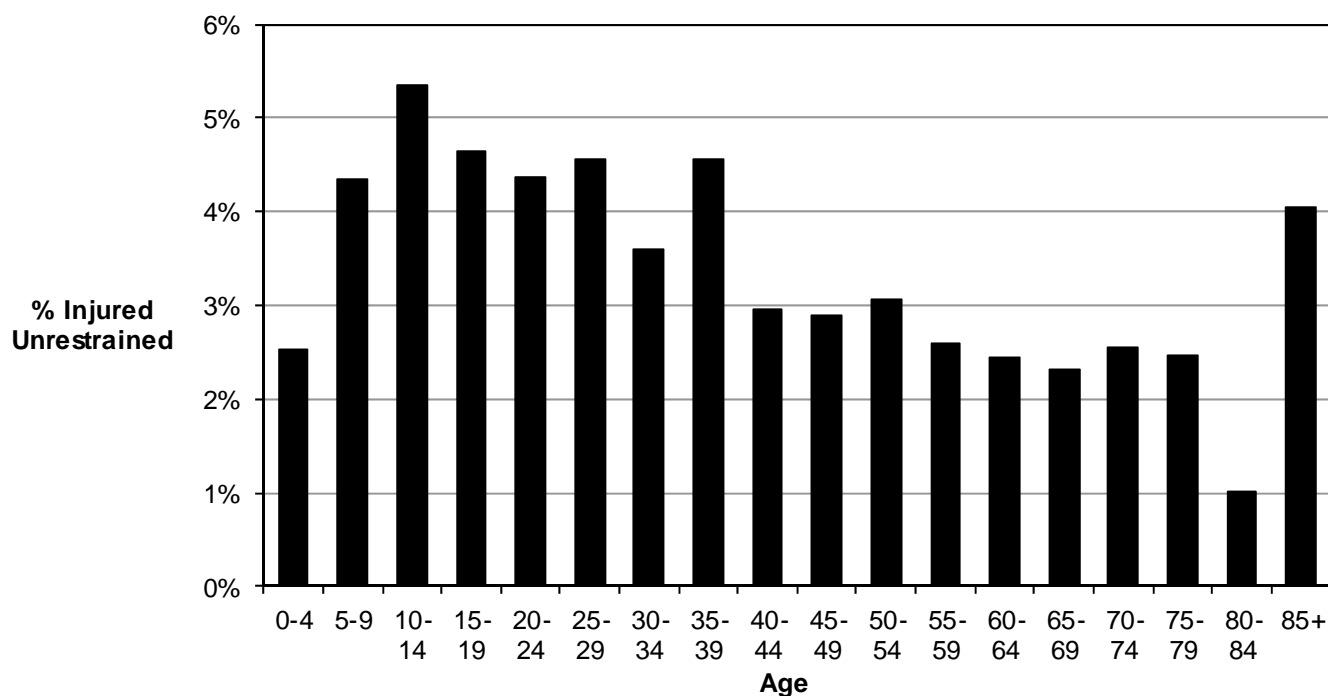
Persons												
Gender	Non-Injured			Injured			Killed			Total		
	Unres	Restrained	%	Unres	Restrained	%	Unres	Restrained	%	Unrestrained	Restrained	
	#	#	%	#	#	%	#	#	%	#	#	%
Female	496	51,679	99.0%	363	12,410	97.2%	27	39	59.1%	886	64,128	98.6%
Male	919	64,432	98.6%	478	9,065	95.0%	53	44	45.4%	1,450	73,541	98.1%
Unknown	115	415	78.3%	5	33	86.8%	0	0	n/a	120	448	78.9%
Total	1,530	116,526	98.7%	846	21,508	96.2%	80	83	50.9%	2,456	138,117	98.3%

- Overall, restraint use of female (98.6%) crash occupants was slightly higher than males (98.1%).
- For persons killed, female crash occupants had higher restraint use (59%) than males (45%).

Vehicle Occupants

Restraint Use by Age of Crash Occupants (Utah 2016)

Persons												
Age	Non-Injured			Injured			Killed			Total		
	Unres	Restrained		Unres	Restrained		Unres	Restrained		Unrestrained	Restrained	
	#	#	%	#	#	%	#	#	%	#	#	%
0-4	25	5,216	99.5%	11	425	97.5%	2	1	33.3%	38	5,642	99.3%
5-9	26	4,122	99.4%	25	551	95.7%	1	0	0.0%	52	4,673	98.9%
10-14	29	3,891	99.3%	40	709	94.7%	2	0	0.0%	71	4,600	98.5%
15-19	185	17,335	98.9%	139	2,849	95.3%	11	14	56.0%	335	20,198	98.4%
20-24	178	16,334	98.9%	129	2,824	95.6%	11	8	42.1%	318	19,166	98.4%
25-29	138	12,017	98.9%	109	2,283	95.4%	7	10	58.8%	254	14,310	98.3%
30-34	142	10,240	98.6%	76	2,039	96.4%	6	6	50.0%	224	12,285	98.2%
35-39	137	9,337	98.6%	87	1,822	95.4%	5	5	50.0%	229	11,164	98.0%
40-44	96	7,507	98.7%	46	1,507	97.0%	5	2	28.6%	147	9,016	98.4%
45-49	111	6,169	98.2%	38	1,275	97.1%	5	3	37.5%	154	7,447	98.0%
50-54	95	5,385	98.3%	37	1,167	96.9%	3	5	62.5%	135	6,557	98.0%
55-59	84	4,899	98.3%	30	1,125	97.4%	5	8	61.5%	119	6,032	98.1%
60-64	60	4,217	98.6%	23	918	97.6%	5	3	37.5%	88	5,138	98.3%
65-69	34	3,105	98.9%	16	677	97.7%	0	3	100.0%	50	3,785	98.7%
70-74	22	2,085	99.0%	12	458	97.4%	5	1	16.7%	39	2,544	98.5%
75-79	8	1,353	99.4%	8	318	97.5%	5	4	44.4%	21	1,675	98.8%
80-84	8	829	99.0%	2	196	99.0%	1	4	80.0%	11	1,029	98.9%
85+	4	605	99.3%	6	142	95.9%	1	6	85.7%	11	753	98.6%
Unknown	148	1,880	92.7%	12	223	94.9%	0	0	n/a	160	2,103	92.9%
Total	1,530	116,526	98.7%	846	21,508	96.2%	80	83	50.9%	2,456	138,117	98.3%



- Overall, injured crash occupants aged 10-14 years had the highest percentage of being unrestrained.
- Crash occupants aged 15-24 years had the highest amount of unrestrained occupant deaths.

Vehicle Occupants

Restraint Use by County (Utah 2016)

Persons												
County	Non-Injured			Injured			Killed			Total		
	Unres	Restrained		Unres	Restrained		Unres	Restrained		Unrestrained	Restrained	
	#	#	%	#	#	%	#	#	%	#	#	%
Daggett	0	23	100.0%	0	0	n/a	0	0	n/a	0	23	100.0%
Davis	126	11,382	98.9%	62	2,065	97.1%	3	12	80.0%	191	13,459	98.6%
Utah	202	17,558	98.9%	101	3,430	97.1%	12	10	45.5%	315	20,998	98.5%
Cache	37	3,706	99.0%	24	540	95.7%	3	4	57.1%	64	4,250	98.5%
Salt Lake	664	53,877	98.8%	286	9,857	97.2%	11	14	56.0%	961	63,748	98.5%
Weber	91	8,716	99.0%	71	1,829	96.3%	4	7	63.6%	166	10,552	98.5%
Washington	59	5,669	99.0%	46	954	95.4%	2	4	66.7%	107	6,627	98.4%
Kane	0	248	100.0%	4	50	92.6%	1	1	50.0%	5	299	98.4%
Morgan	4	205	98.1%	0	30	100.0%	0	0	n/a	4	235	98.3%
Wasatch	18	1,190	98.5%	8	162	95.3%	1	4	80.0%	27	1,356	98.0%
Summit	35	1,879	98.2%	19	309	94.2%	1	3	75.0%	55	2,191	97.6%
Iron	30	1,660	98.2%	23	275	92.3%	2	0	0.0%	55	1,935	97.2%
Box Elder	54	2,600	98.0%	28	464	94.3%	6	1	14.3%	88	3,065	97.2%
San Juan	7	345	98.0%	3	36	92.3%	1	1	50.0%	11	382	97.2%
Carbon	14	617	97.8%	8	94	92.2%	2	0	0.0%	24	711	96.7%
Garfield	4	296	98.7%	4	53	93.0%	4	0	0.0%	12	349	96.7%
Uintah	22	785	97.3%	9	102	91.9%	0	1	100.0%	31	888	96.6%
Juab	17	584	97.2%	7	133	95.0%	2	3	60.0%	26	720	96.5%
Grand	8	300	97.4%	5	57	91.9%	1	2	66.7%	14	359	96.2%
Millard	11	707	98.5%	22	152	87.4%	2	3	60.0%	35	862	96.1%
Tooele	47	1,755	97.4%	31	377	92.4%	9	8	47.1%	87	2,140	96.1%
Wayne	4	60	93.8%	0	20	100.0%	0	0	n/a	4	80	95.2%
Emery	15	346	95.8%	5	88	94.6%	3	3	50.0%	23	437	95.0%
Rich	1	79	98.8%	4	10	71.4%	0	0	n/a	5	89	94.7%
Sevier	13	536	97.6%	18	139	88.5%	7	0	0.0%	38	675	94.7%
Duchesne	13	467	97.3%	19	68	78.2%	0	0	n/a	32	535	94.4%
Beaver	18	455	96.2%	16	101	86.3%	0	0	n/a	34	556	94.2%
Sanpete	15	436	96.7%	20	105	84.0%	2	2	50.0%	37	543	93.6%
Piute	1	45	97.8%	3	8	72.7%	1	0	0.0%	5	53	91.4%
Statewide	1,530	116,526	98.7%	846	21,508	96.2%	80	83	50.9%	2,456	138,117	98.3%

- Daggett, Davis, Utah, and Cache counties had the highest percentage of occupants that were restrained. Piute, Sanpete, Beaver, and Duchesne counties had the lowest percentage.

Restraint Use by Urban/Rural Location (Utah 2016)

Persons												
Location	Non-Injured			Injured			Killed			Total		
	Unres	Restrained		Unres	Restrained		Unres	Restrained		Unrestrained	Restrained	
	#	#	%	#	#	%	#	#	%	#	#	%
Urban	1,179	100,908	98.8%	590	18,675	96.9%	35	51	59.3%	1,804	119,634	98.5%
Rural	351	15,618	97.8%	256	2,833	91.7%	45	32	41.6%	652	18,483	96.6%
Statewide	1,530	116,526	98.7%	846	21,508	96.2%	80	83	50.9%	2,456	138,117	98.3%

- Urban areas had a higher percentage of occupants that were restrained for all injury severity levels.
- Occupants in rural crashes were 2.3 times more likely to be unrestrained than occupants in urban crashes.

Vehicle Occupants

Restraint Use by Ejection (Utah 2016)

Persons												
Ejection Status	Non-Injured			Injured			Killed			Total		
	Unres	Restrained		Unres	Restrained		Unres	Restrained		Unrestrained	Restrained	
	#	#	%	#	#	%	#	#	%	#	#	%
Not Ejected	1,479	116,182	98.7%	716	21,403	96.8%	33	75	69.4%	2,228	137,660	98.4%
Partially Ejected	1	0	0.0%	19	8	29.6%	8	4	33.3%	28	12	30.0%
Fully Ejected	2	1	33.3%	88	23	20.7%	38	4	9.5%	128	28	17.9%
Total	1,482	116,183	98.7%	823	21,434	96.3%	79	83	51.2%	2,384	137,700	98.3%

- There is an inverse relationship between ejection from a motor vehicle and restraint use.
- The majority (98.4%) of crash occupants not ejected from a motor vehicle were restrained compared to only 17.9% of crash occupants fully ejected from a motor vehicle.
- Unrestrained occupants were 240 times more likely to be ejected from a motor vehicle compared to restrained occupants.
- Ejection from the vehicle is one of the most harmful events that can happen to a person in a crash. Seat belts are effective in preventing total ejections.

Restraint Use by Occupant Placement (Utah 2016)

Persons												
Occupant Placement	Non-Injured			Injured			Killed			Total		
	Unres	Restrained		Unres	Restrained		Unres	Restrained		Unrestrained	Restrained	
	#	#	%	#	#	%	#	#	%	#	#	%
Driver	1,157	83,606	98.6%	516	15,326	96.7%	49	57	53.8%	1,722	98,989	98.3%
Front Seat	124	16,440	99.3%	151	3,948	96.3%	6	18	75.0%	281	20,406	98.6%
Back Seat(s)	140	15,951	99.1%	134	2,168	94.2%	17	7	29.2%	291	18,126	98.4%
Other/Unknown	109	529	82.9%	45	66	59.5%	8	1	11.1%	162	596	78.6%
Total	1,530	116,526	98.7%	846	21,508	96.2%	80	83	50.9%	2,456	138,117	98.3%

- Among all occupants injured, drivers had the highest restraint use (96.7%).
- Among all occupants killed, front seat passengers had the highest restraint use (75.0%)

Restraint Use by Vehicle Type (Utah 2016)

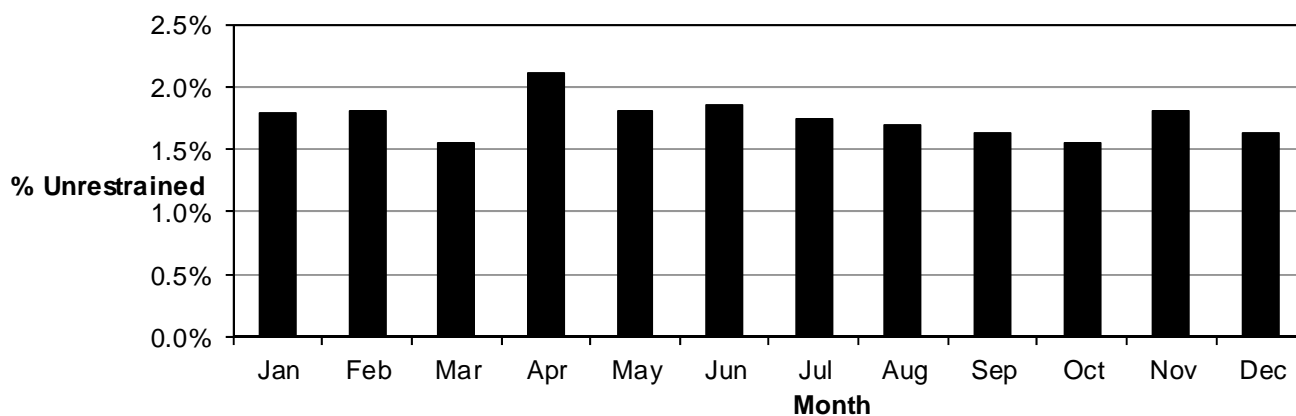
Persons												
Vehicle Type	Non-Injured			Injured			Killed			Total		
	Unres	Restrained		Unres	Restrained		Unres	Restrained		Unrestrained	Restrained	
	#	#	%	#	#	%	#	#	%	#	#	%
Van	109	8,718	98.8%	34	1,457	97.7%	5	3	37.5%	148	10,178	98.6%
SUV	291	28,650	99.0%	208	4,992	96.0%	21	18	46.2%	520	33,660	98.5%
Passenger Car	663	57,794	98.9%	407	12,549	96.9%	25	54	68.4%	1,095	70,397	98.5%
Pickup Truck	305	17,970	98.3%	166	2,289	93.2%	26	8	23.5%	497	20,267	97.6%
Heavy Truck	145	3,277	95.8%	30	210	87.5%	3	0	0.0%	178	3,487	95.1%
RV/Motorhome	17	117	87.3%	1	11	91.7%	0	0	n/a	18	128	87.7%
Total	1,530	116,526	98.7%	846	21,508	96.2%	80	83	50.9%	2,456	138,117	98.3%

- Occupants in RV/motorhome, heavy truck, and pickup truck were the least likely to be restrained.

Vehicle Occupants

Restraint Use by Month (Utah 2016)

Persons										
Month	Unrestrained					Restrained				
	Not Injured	Injured	Killed	Total	%	Not Injured	Injured	Killed	Total	%
January	146	66	5	217	1.8%	10,123	1,808	2	11,933	98.2%
February	106	76	2	184	1.8%	8,444	1,501	12	9,957	98.2%
March	113	48	2	163	1.6%	8,678	1,610	4	10,292	98.4%
April	144	74	7	225	2.1%	8,721	1,652	4	10,377	97.9%
May	121	67	15	203	1.8%	9,271	1,740	8	11,019	98.2%
June	126	76	13	215	1.9%	9,527	1,826	11	11,364	98.1%
July	114	74	7	195	1.7%	9,228	1,777	10	11,015	98.3%
August	117	81	3	201	1.7%	9,753	1,835	6	11,594	98.3%
September	127	71	6	204	1.6%	10,345	1,967	8	12,320	98.4%
October	102	74	8	184	1.6%	9,785	1,882	9	11,676	98.4%
November	166	65	10	241	1.8%	11,096	1,956	5	13,057	98.2%
December	148	74	2	224	1.6%	11,555	1,954	4	13,513	98.4%
Total	1,530	846	80	2,456	1.7%	116,526	21,508	83	138,117	98.3%



- April had the lowest overall restraint use. May had the highest amount of unrestrained deaths. August had the highest number of unrestrained injuries.

Restraint Use by Day of Week (Utah 2016)

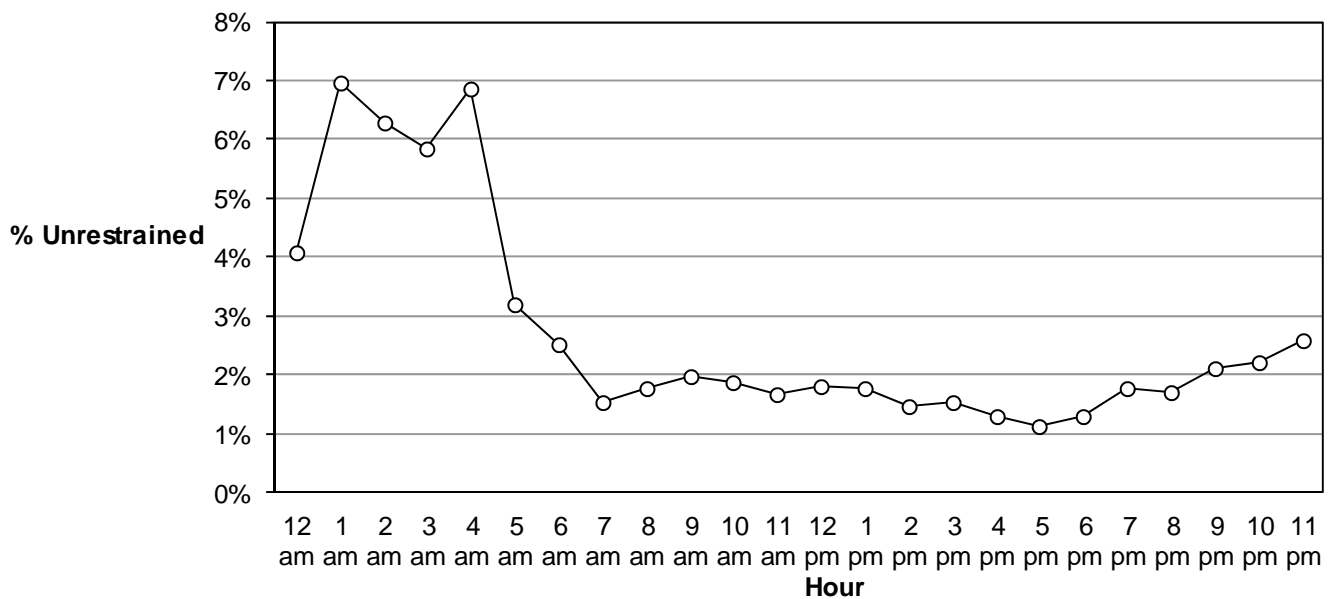
Persons										
Day of Week	Unrestrained					Restrained				
	Not Injured	Injured	Killed	Total	%	Not Injured	Injured	Killed	Total	%
Sunday	194	99	8	301	2.8%	8,690	1,738	11	10,439	97.2%
Monday	215	129	9	353	1.6%	17,989	3,330	12	21,331	98.4%
Tuesday	199	96	9	304	1.4%	17,622	3,159	7	20,788	98.6%
Wednesday	211	121	13	345	1.6%	17,461	3,231	14	20,706	98.4%
Thursday	213	120	16	349	1.6%	18,041	3,320	11	21,372	98.4%
Friday	265	145	7	417	1.7%	20,742	3,731	15	24,488	98.3%
Saturday	233	136	18	387	2.0%	15,981	2,999	13	18,993	98.0%
Total	1,530	846	80	2,456	1.7%	116,526	21,508	83	138,117	98.3%

- Weekends had the lowest restraint use.

Vehicle Occupants

Restraint Use by Hour (Utah 2016)

Persons										
Hour	Unrestrained					Restrained				
	Not Injured	Injured	Killed	Total	%	Not Injured	Injured	Killed	Total	%
Midnight	34	32	1	67	4.1%	1,246	326	3	1,575	95.9%
1 a.m.	36	28	1	65	7.0%	657	206	4	867	93.0%
2 a.m.	30	12	2	44	6.3%	511	141	2	654	93.7%
3 a.m.	17	9	6	32	5.8%	383	130	3	516	94.2%
4 a.m.	29	13	2	44	6.9%	460	138	0	598	93.1%
5 a.m.	19	15	5	39	3.2%	939	238	3	1,180	96.8%
6 a.m.	42	27	1	70	2.5%	2,268	435	0	2,703	97.5%
7 a.m.	58	38	4	100	1.5%	5,510	971	2	6,483	98.5%
8 a.m.	86	43	6	135	1.8%	6,341	1,146	1	7,488	98.2%
9 a.m.	73	36	3	112	2.0%	4,711	865	0	5,576	98.0%
10 a.m.	62	31	1	94	1.9%	4,145	779	2	4,926	98.1%
11 a.m.	67	36	3	106	1.7%	5,297	956	4	6,257	98.3%
Noon	99	43	2	144	1.8%	6,657	1,261	7	7,925	98.2%
1 p.m.	103	40	8	151	1.8%	7,074	1,272	11	8,357	98.2%
2 p.m.	94	42	4	140	1.5%	8,022	1,459	4	9,485	98.5%
3 p.m.	116	62	5	183	1.5%	10,077	1,724	1	11,802	98.5%
4 p.m.	105	58	5	168	1.3%	10,983	1,854	4	12,841	98.7%
5 p.m.	110	64	6	180	1.1%	13,598	2,412	5	16,015	98.9%
6 p.m.	93	57	1	151	1.3%	9,631	1,834	6	11,471	98.7%
7 p.m.	69	48	7	124	1.8%	5,808	1,041	9	6,858	98.2%
8 p.m.	51	28	2	81	1.7%	3,924	738	4	4,666	98.3%
9 p.m.	56	39	1	96	2.1%	3,793	666	1	4,460	97.9%
10 p.m.	48	26	1	75	2.2%	2,803	536	2	3,341	97.8%
11 p.m.	33	19	3	55	2.6%	1,688	380	5	2,073	97.4%
Total	1,530	846	80	2,456	1.7%	116,526	21,508	83	138,117	98.3%



- Vehicle occupants were least likely to be restrained at night (midnight to 4:59 a.m.).

Children and Restraint Use

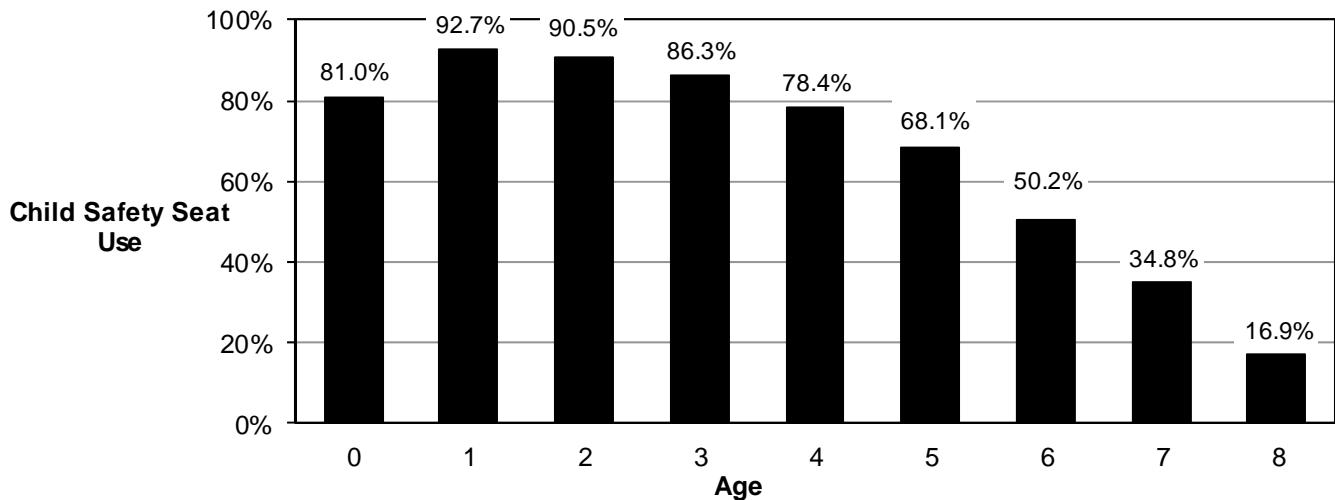
Restraint Use for Children Age 0 to 8 Years (Utah 2016)

Child Occupants								
Restraint Use	Ages 0-1		Ages 2-4		Ages 5-8		Total	
	#	%	#	%	#	%	#	%
Child Safety Seat	2,107	86.5%	2,751	85.1%	1,637	42.9%	6,495	68.4%
Seat Belt Only	311	12.8%	463	14.3%	2,141	56.0%	2,915	30.7%
Unrestrained	19	0.8%	19	0.6%	42	1.1%	80	0.8%
Total	2,437	100.0%	3,233	100.0%	3,820	100.0%	9,490	100.0%

- The older the child the less likely they were using a child safety seat.
- The drastic decrease in child safety seat use for children aged 5-8 years is concerning. This indicates that children are moving to adult-sized seat belts too early.

Child Safety Seat Use of Children (0 to 8 Years) by Age (Utah 2016)

Persons						
Age	Child Safety Seat Used		Child Safety Seat Not Used		Total	
	#	%	#	%	#	%
0	1,042	81.0%	245	19.0%	1,287	100.0%
1	1,075	92.7%	85	7.3%	1,160	100.0%
2	995	90.5%	104	9.5%	1,099	100.0%
3	908	86.3%	144	13.7%	1,052	100.0%
4	848	78.4%	234	21.6%	1,082	100.0%
5	667	68.1%	312	31.9%	979	100.0%
6	482	50.2%	479	49.8%	961	100.0%
7	330	34.8%	617	65.2%	947	100.0%
8	158	16.9%	775	83.1%	933	100.0%
Total	6,505	68.5%	2,995	31.5%	9,500	100.0%



- While over 86% of children ages 0 and 1 years were in a child safety seat, only 78% of 4-year-olds, 50% of 6-year-olds, and 17% of 8-year-olds were in a child safety seat.

Speed



2

Section 3: Speed



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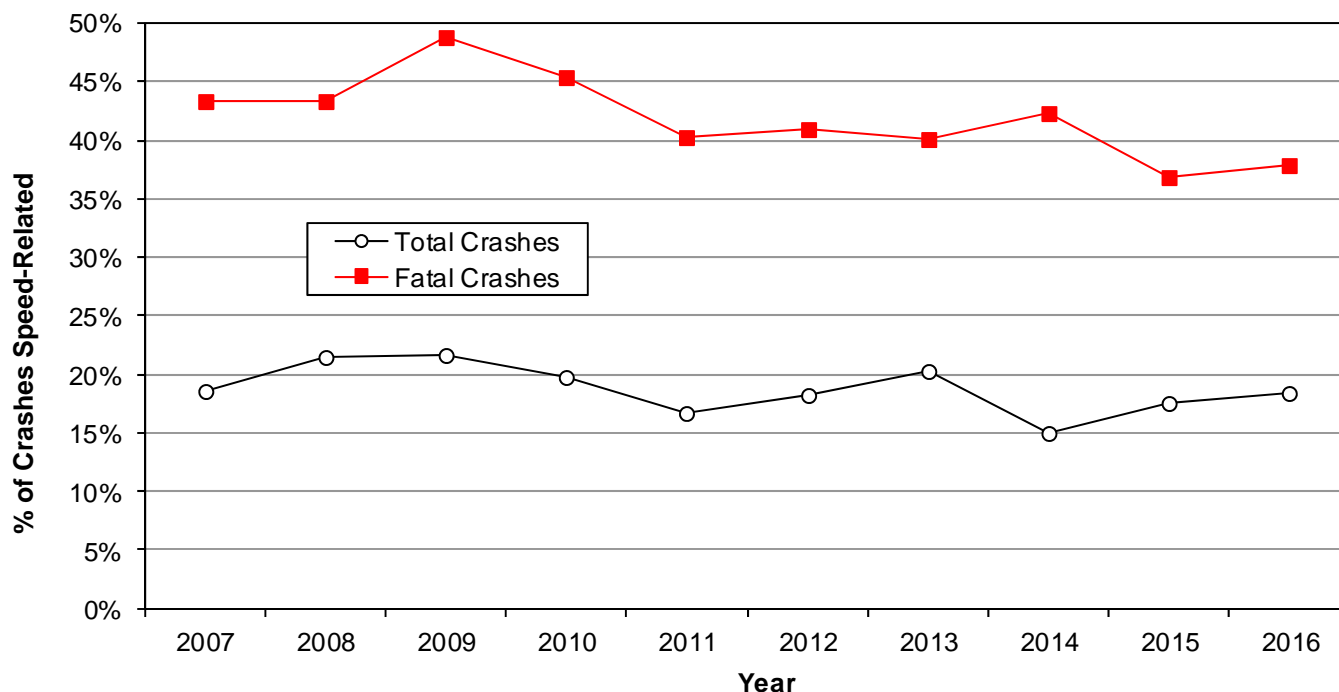
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Trends

Speed-Related Crashes (Utah 2007-2016)

Speed-Related Crashes												
Year	Property Damage Only			Injury			Fatal			Total		
	All	Speed		All	Speed		All	Speed		All	Speed	
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	7,612	18.0%	18,619	3,687	19.8%	258	112	43.4%	61,245	11,411	18.6%
2008	38,997	8,311	21.3%	17,125	3,622	21.2%	245	106	43.3%	56,367	12,039	21.4%
2009	35,398	7,607	21.5%	15,752	3,379	21.5%	217	106	48.8%	51,367	11,092	21.6%
2010	34,155	6,591	19.3%	14,995	3,026	20.2%	218	99	45.4%	49,368	9,716	19.7%
2011	36,418	5,724	15.7%	15,645	2,885	18.4%	224	90	40.2%	52,287	8,699	16.6%
2012	34,635	6,135	17.7%	15,765	2,970	18.8%	200	83	41.5%	50,600	9,188	18.2%
2013	39,301	7,925	20.2%	16,134	3,225	20.0%	202	81	40.1%	55,637	11,231	20.2%
2014	37,388	5,302	14.2%	16,426	2,631	16.0%	222	94	42.3%	54,036	8,027	14.9%
2015	42,089	7,050	16.8%	17,665	3,362	19.0%	258	95	36.8%	60,012	10,507	17.5%
2016	43,465	7,714	17.7%	18,747	3,696	19.7%	259	98	37.8%	62,471	11,508	18.4%
Total	384,214	69,971	18.2%	166,873	32,483	19.5%	2,303	964	41.9%	553,390	103,418	18.7%



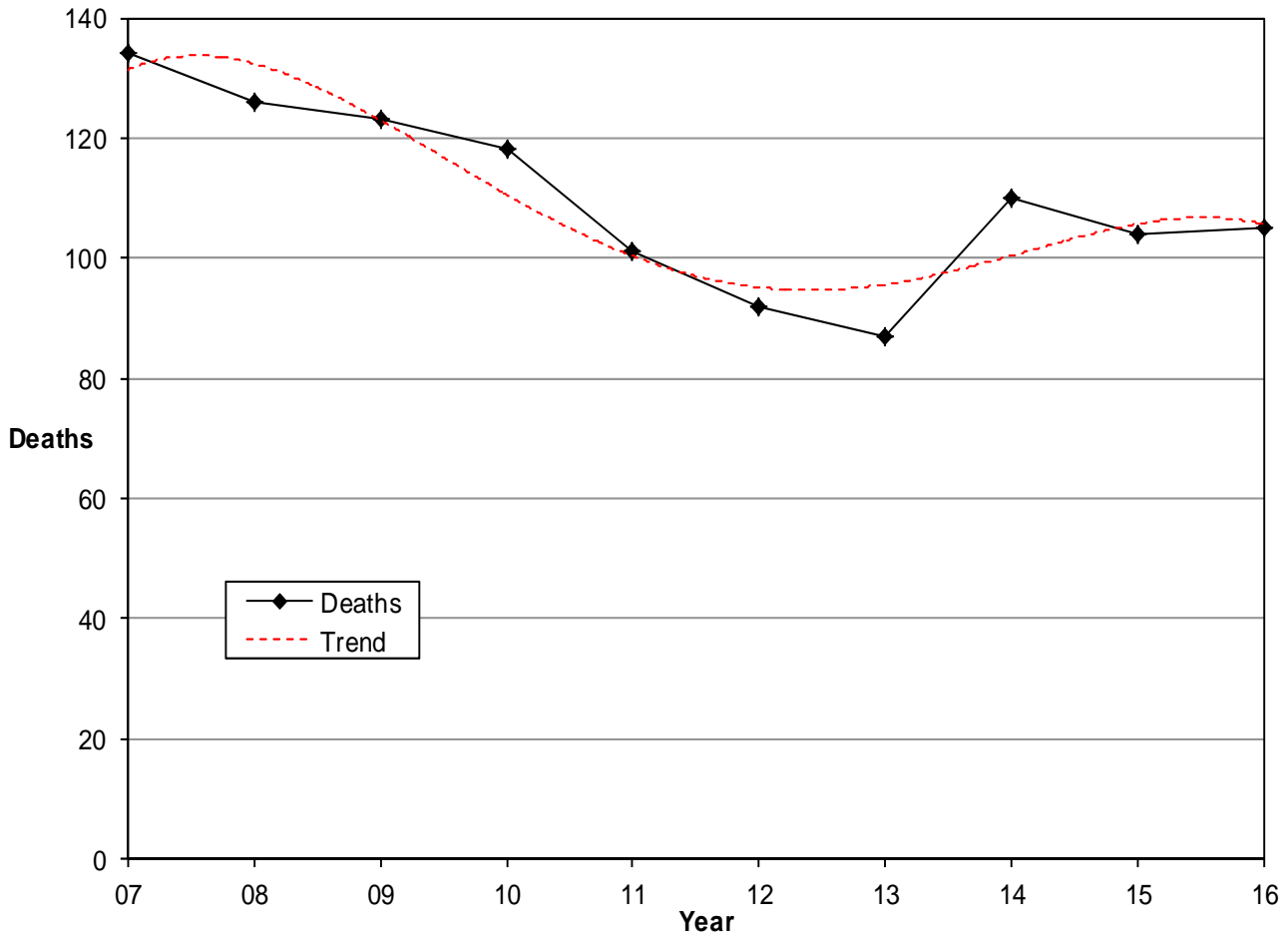
- Speed-related crashes are a concern because of the increased potential for severe injury and death.
- The 10-year trend shows that 19% of total crashes and 42% of fatal crashes in Utah are speed-related.
- 2008 had the highest number of crashes that were speed-related while 2009 had the highest percent.
- 2007 had the highest number of fatal crashes that were speed-related while 2009 had the highest percent.
- Over the last 10 years, speed-related crashes were 3.1 times more likely to be fatal than other crashes.

Note: A crash is considered speed-related when a driver exceeded posted speed limits or was driving too fast for conditions. "Driving too fast for conditions" is more likely to result in less severe crashes. "Exceeding posted speed limits" is more likely to result in more severe crashes as the higher the speed the greater the amount of energy that must be absorbed in a crash, hence there is more likelihood of serious injury and death.

Trends

Speed-Related Deaths (Utah 2007-2016)

Year	Speed Crashes					
	Deaths			Fatal Crashes		
	All	Speed		All	Speed	
	#	#	%	#	#	%
2007	299	134	44.8%	260	112	43.1%
2008	276	126	45.7%	244	106	43.4%
2009	244	123	50.4%	217	106	48.8%
2010	253	118	46.6%	218	99	45.4%
2011	243	101	41.6%	224	90	40.2%
2012	217	92	42.4%	200	83	41.5%
2013	220	87	39.5%	202	81	40.1%
2014	256	110	43.0%	222	94	42.3%
2015	278	104	37.4%	258	95	36.8%
2016	281	105	37.4%	259	98	37.8%
Total	2,567	1,100	42.9%	2,304	964	41.8%

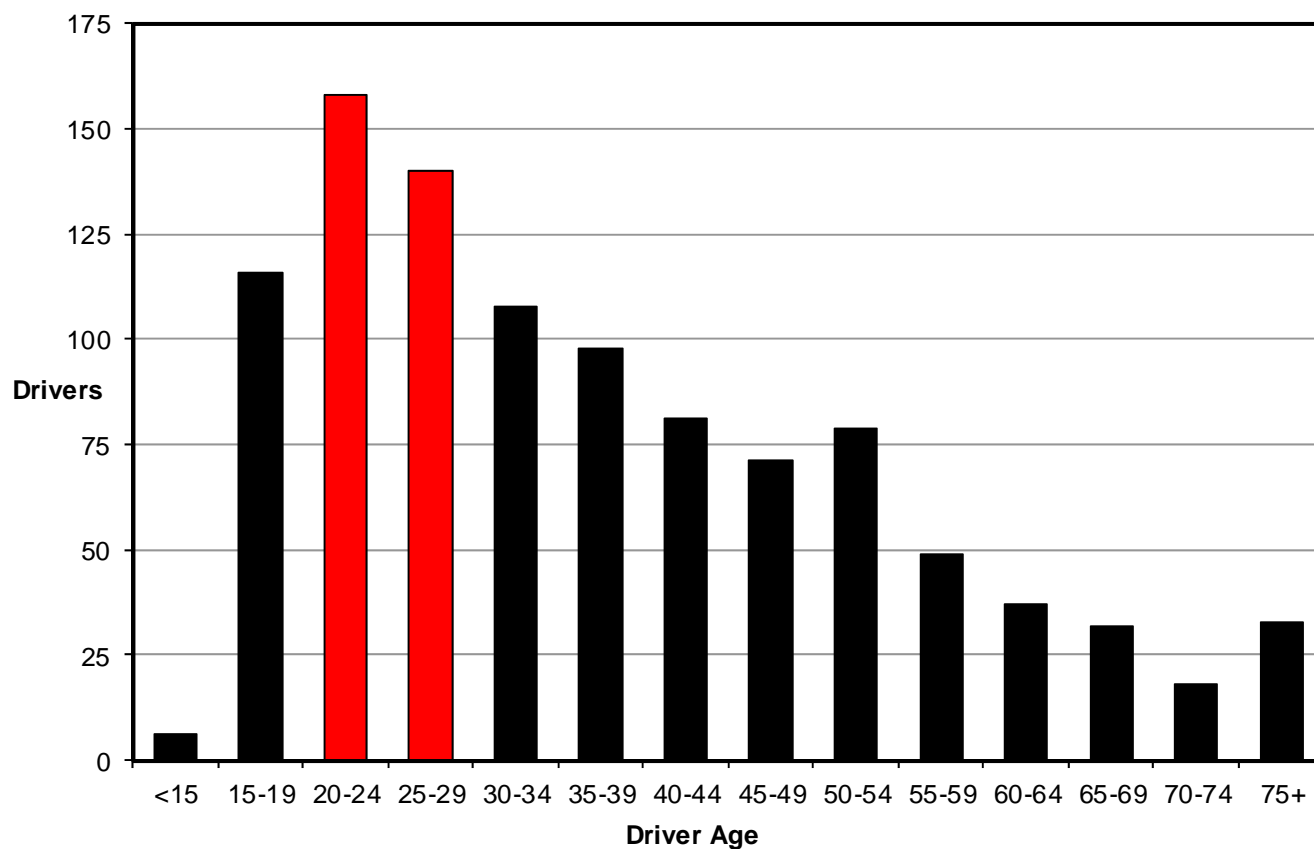


- Over the past 10 years, the percentage of deaths and fatal crashes that were speed-related has fluctuated around 43% of all deaths and 42% of fatal crashes.
- On average, 110 people die a year in Utah from speed-related crashes.

Trends

Speed-Related Drivers in Fatal Crashes (Utah 2007-2016)

Speed-Related Drivers in Fatal Crashes												
Age	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
<15	0	1	1	0	0	1	0	0	2	1	6	0.6%
15-19	22	14	12	12	11	9	8	10	6	12	116	11.3%
20-24	23	20	20	14	11	11	9	13	23	14	158	15.4%
25-29	14	19	12	17	15	10	13	12	13	15	140	13.6%
30-34	11	14	9	14	13	10	10	5	12	10	108	10.5%
35-39	8	11	11	12	9	7	7	16	5	12	98	9.6%
40-44	11	6	16	5	7	8	8	7	4	9	81	7.9%
45-49	11	4	13	7	6	5	5	8	6	6	71	6.9%
50-54	6	9	7	8	5	6	6	15	13	4	79	7.7%
55-59	3	6	9	6	4	3	6	4	7	1	49	4.8%
60-64	4	1	3	0	6	6	0	6	5	6	37	3.6%
65-69	2	1	5	3	4	2	3	2	4	6	32	3.1%
70-74	1	1	1	2	0	3	4	1	3	2	18	1.8%
75+	2	2	4	5	2	2	6	1	5	4	33	3.2%
Total	118	109	123	105	93	83	85	100	108	102	1,026	100.0%



- Over the past 10 years, over one-fourth (29%) of the speed-related drivers in fatal crashes were aged 20-29 years.
- Drivers over age 60 years had the lowest number of speed-related drivers in fatal crashes.

Crash Conditions

Speed-Related Crashes by County (Utah 2016)

Speed-Related Crashes								
County	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT
Wasatch	145	36.1	66	16.4	2	0.50	213	53.0
Salt Lake	3,394	34.5	1,567	15.9	17	0.17	4,978	50.6
Morgan	52	34.9	16	10.7	1	0.67	69	46.3
Box Elder	302	29.9	135	13.4	5	0.50	442	43.8
Rich	13	23.7	9	16.4	0	0.00	22	40.0
Utah	1,156	24.5	621	13.2	9	0.19	1,786	37.8
Cache	273	27.4	91	9.1	6	0.60	370	37.1
Beaver	76	25.2	30	9.9	0	0.00	106	35.1
Garfield	21	16.1	21	16.1	3	2.31	45	34.6
Summit	190	22.2	89	10.4	3	0.35	282	32.9
Weber	386	21.5	186	10.4	7	0.39	579	32.2
Davis	622	21.0	299	10.1	8	0.27	929	31.4
Millard	112	19.8	53	9.4	2	0.35	167	29.6
Iron	153	18.3	76	9.1	2	0.24	231	27.7
Wayne	6	11.0	9	16.5	0	0.00	15	27.4
Juab	87	19.4	31	6.9	3	0.67	121	26.9
Sanpete	43	17.3	18	7.3	3	1.21	64	25.8
Sevier	62	16.9	31	8.5	1	0.27	94	25.7
Tooele	139	15.4	82	9.1	7	0.78	228	25.3
Duchesne	43	13.1	29	8.9	1	0.31	73	22.3
Carbon	52	14.8	24	6.8	2	0.57	78	22.3
Piute	4	12.3	3	9.2	0	0.00	7	21.5
Washington	210	12.6	122	7.3	7	0.42	339	20.4
Emery	48	12.3	28	7.2	3	0.77	79	20.3
Uintah	59	13.5	25	5.7	1	0.23	85	19.4
Daggett	4	11.5	0	0.0	1	2.88	5	14.4
San Juan	29	8.7	8	2.4	1	0.30	38	11.5
Kane	8	4.8	11	6.6	0	0.00	19	11.4
Grand	25	6.2	16	3.9	3	0.74	44	10.8
Statewide	7,714	25.1	3,696	12.0	98	0.32	11,508	37.4

- Wasatch (53.0), Salt Lake (50.6), Morgan (46.3), and Box Elder (43.8) counties had the highest rates of speed-related total crashes per 100 million vehicle miles traveled.
- Daggett (2.88), Garfield (2.31), and Sanpete (1.21) counties had the highest rates of fatal speed-related crashes per 100 million vehicle miles traveled.
- Grand (10.8), Kane (11.4), and San Juan (11.5) counties had the lowest rates of speed-related total crashes per 100 million vehicle miles traveled.

Speed-Related Crashes by Urban/Rural Location (Utah 2016)

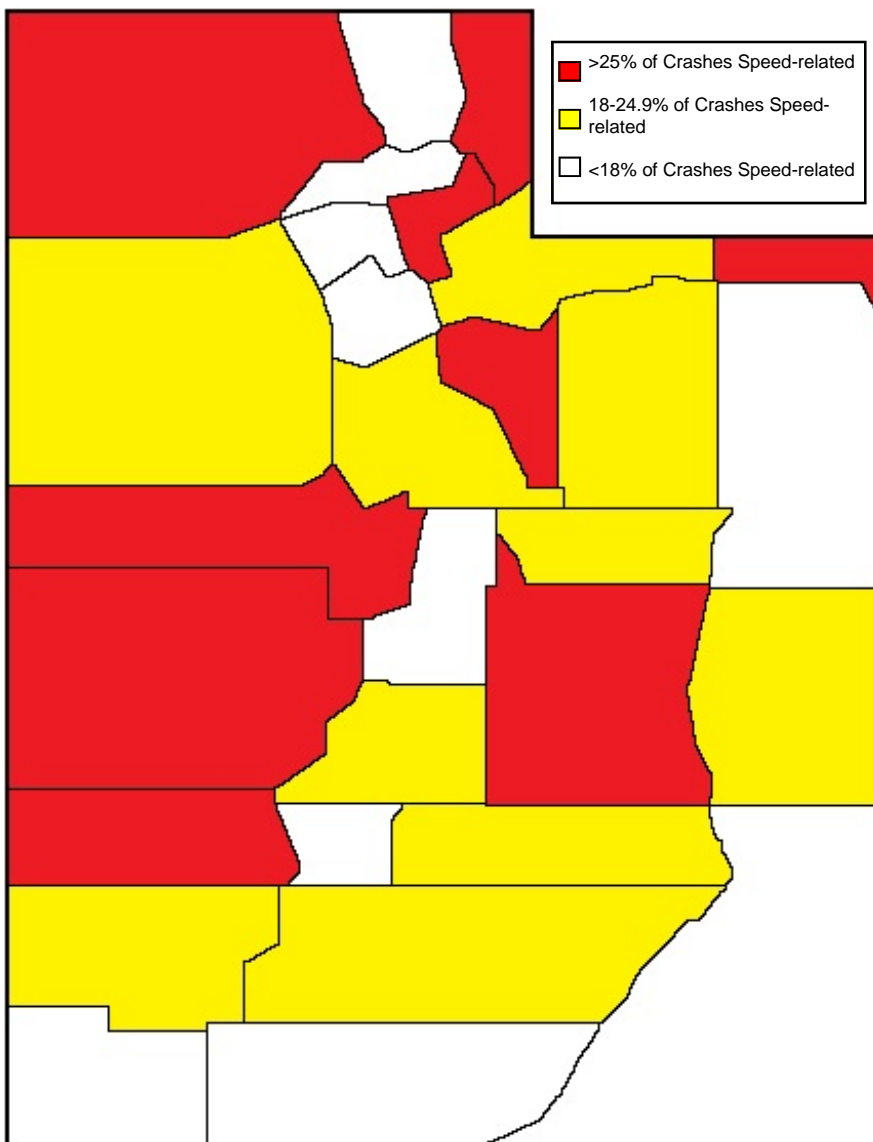
- Urban areas had a higher rate of total speed-related crashes per VMT while Rural areas had a higher rate for fatal speed crashes.
- Speed-related crashes occurring in rural areas were 2.9 times more likely to result in a death than speed-related crashes in urban areas.

Speed-Related Crashes								
Location	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per 100 Million	#	Rate per 100 Million	#	Rate per 100 Million	#	Rate per 100 Million
Urban	6,041	27.5	2,886	13.1	54	0.25	8,981	40.9
Rural	1,673	19.0	810	9.2	44	0.50	2,527	28.7
Total	7,714	25.1	3,696	12.0	98	0.32	11,508	37.4

Crash Conditions

Percent of Crashes Speed-Related by County (Utah 2016)

Speed-Related Crashes			
County	Total Crashes	Total Speed	
	#	#	%
Beaver	251	106	42.2%
Morgan	166	69	41.6%
Millard	434	167	38.5%
Daggett	14	5	35.7%
Juab	353	121	34.3%
Box Elder	1,359	442	32.5%
Emery	256	79	30.9%
Wasatch	726	213	29.3%
Rich	81	22	27.2%
Iron	951	231	24.3%
Duchesne	302	73	24.2%
Sevier	390	94	24.1%
Summit	1,193	282	23.6%
Wayne	64	15	23.4%
Tooele	1,107	228	20.6%
Carbon	385	78	20.3%
Grand	222	44	19.8%
Garfield	230	45	19.6%
Utah	9,365	1,786	19.1%
Piute	39	7	17.9%
Cache	2,064	370	17.9%
Salt Lake	28,287	4,978	17.6%
Sanpete	364	64	17.6%
Uintah	499	85	17.0%
Davis	5,776	929	16.1%
San Juan	266	38	14.3%
Weber	4,413	579	13.1%
Washington	2,706	339	12.5%
Kane	208	19	9.1%
Statewide	62,471	11,508	18.4%



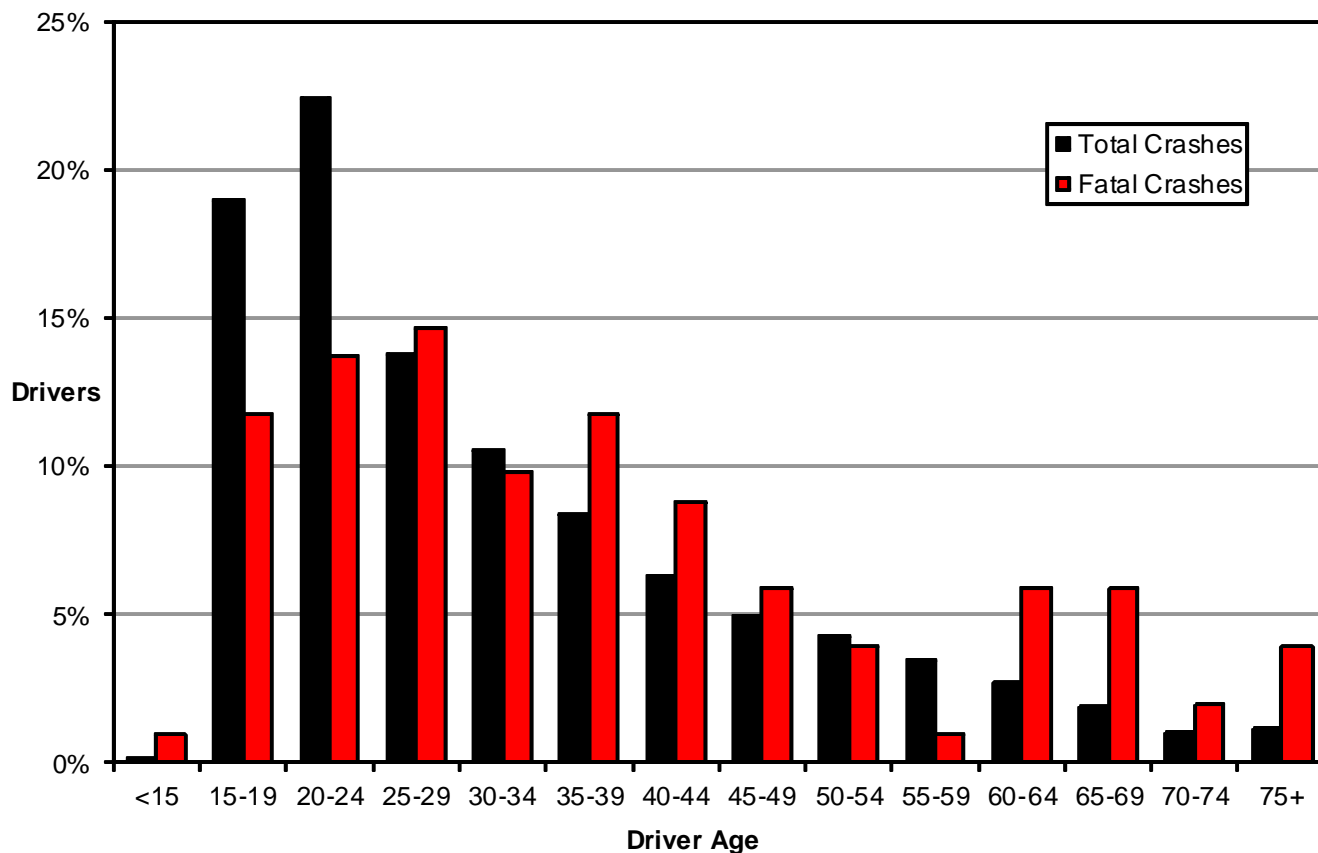
- Beaver (42%), Morgan (42%), and Millard (39%) counties had the highest percent of crashes that were speed-related.
- Kane (9%), Washington (13%), and Weber (13%) counties had the lowest percent of crashes that were speed-related.



Crash Conditions

Age of Drivers in Speed-Related Crashes (Utah 2016)

Speed-Related Drivers								
Age	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
<15	4	0.0%	13	0.3%	1	1.0%	18	0.1%
15-19	1,539	19.1%	682	17.4%	12	11.7%	2,233	18.5%
20-24	1,791	22.2%	832	21.2%	14	13.6%	2,637	21.8%
25-29	1,061	13.2%	546	13.9%	15	14.6%	1,622	13.4%
30-34	832	10.3%	399	10.2%	10	9.7%	1,241	10.3%
35-39	633	7.9%	339	8.7%	12	11.7%	984	8.1%
40-44	497	6.2%	231	5.9%	9	8.7%	737	6.1%
45-49	374	4.6%	205	5.2%	6	5.8%	585	4.8%
50-54	327	4.1%	167	4.3%	4	3.9%	498	4.1%
55-59	252	3.1%	150	3.8%	1	1.0%	403	3.3%
60-64	198	2.5%	112	2.9%	6	5.8%	316	2.6%
65-69	134	1.7%	82	2.1%	6	5.8%	222	1.8%
70-74	81	1.0%	38	1.0%	2	1.9%	121	1.0%
75+	76	0.9%	56	1.4%	4	3.9%	136	1.1%
Unknown	258	3.2%	66	1.7%	1	1.0%	325	2.7%
Total	8,057	100.0%	3,918	100.0%	103	100.0%	12,078	100.0%



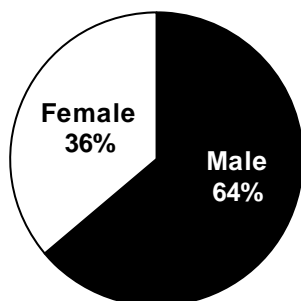
- Younger drivers (15-24 years) had the highest percentage of total speed-related crashes.
- Drivers aged 15-39 years had the highest percentage of fatal speed-related crashes.

Crash Conditions

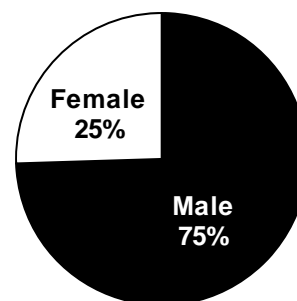
Gender of Drivers in Speed-Related Crashes (Utah 2016)

Speed-Related Drivers								
Gender	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Male	5,073	63.0%	2,384	60.8%	76	73.8%	7,533	62.4%
Female	2,756	34.2%	1,481	37.8%	26	25.2%	4,263	35.3%
Unknown	228	2.8%	53	1.4%	1	1.0%	282	2.3%
Total	8,057	100.0%	3,918	100.0%	103	100.0%	12,078	100.0%

Total Speed-Related Crashes



Fatal Speed-Related Crashes



- Male drivers represented 64% (of known) of the drivers in speed-related total crashes and 75% of the drivers in speed-related fatal crashes.



Speed-Related Crashes by Vehicle Type (Utah 2016)

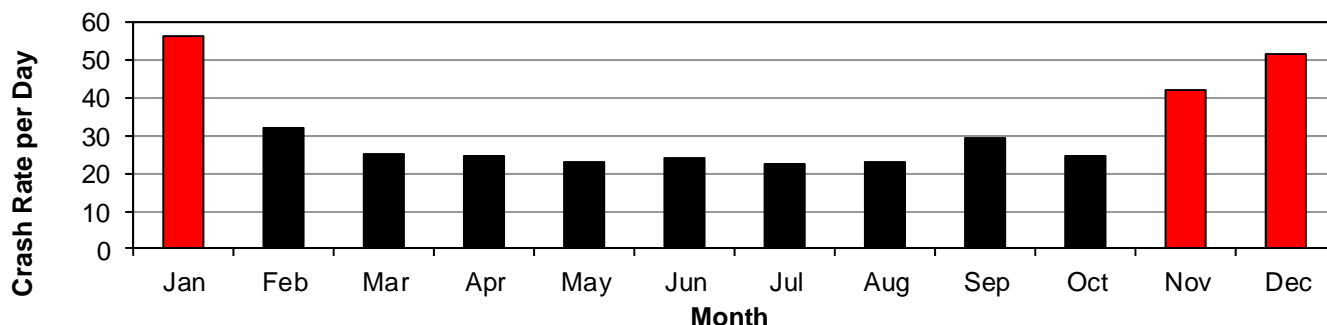
Speed-Related Vehicles								
Vehicle Type	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Passenger Car	4,733	58.6%	2,072	52.9%	43	41.7%	6,848	56.6%
SUV	1,502	18.6%	786	20.1%	16	15.5%	2,304	19.1%
Pickup Truck	1,274	15.8%	572	14.6%	15	14.6%	1,861	15.4%
Van	288	3.6%	157	4.0%	3	2.9%	448	3.7%
Heavy Truck	186	2.3%	79	2.0%	1	1.0%	266	2.2%
Motorcycle	13	0.2%	191	4.9%	18	17.5%	222	1.8%
Off Road Vehicle	6	0.1%	50	1.3%	5	4.9%	61	0.5%
Bus	6	0.1%	4	0.1%	0	0.0%	10	0.1%
RV/Motor Home	4	0.0%	1	0.0%	0	0.0%	5	0.0%
Other	1	0.0%	0	0.0%	1	1.0%	2	0.0%
Unknown	59	0.7%	6	0.2%	1	1.0%	66	0.5%
Total	8,072	100.0%	3,918	100.0%	103	100.0%	12,093	100.0%

- For total speed-related crashes, passenger car and SUV were the leading vehicle types.
- For fatal speed-related crashes, passenger car and motorcycle were the leading vehicle types.
- Motorcycle was overrepresented in fatal speed-related crashes compared to total speed-related crashes (18% to 2%).

Crash Conditions

Speed-Related Crashes by Month (Utah 2016)

Speed-Related Crashes								
Month	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	1,307	42.2	428	13.8	3	0.10	1,738	56.1
February	658	22.7	263	9.1	9	0.31	930	32.1
March	522	16.8	255	8.2	4	0.13	781	25.2
April	447	14.9	282	9.4	6	0.20	735	24.5
May	441	14.2	254	8.2	13	0.42	708	22.8
June	424	14.1	286	9.5	10	0.33	720	24.0
July	398	12.8	282	9.1	15	0.48	695	22.4
August	441	14.2	272	8.8	5	0.16	718	23.2
September	524	17.5	342	11.4	10	0.33	876	29.2
October	461	14.9	287	9.3	7	0.23	755	24.4
November	909	30.3	339	11.3	10	0.33	1,258	41.9
December	1,182	38.1	406	13.1	6	0.19	1,594	51.4
Total	7,714	21.1	3,696	10.1	98	0.27	11,508	31.4



- Overall, January (56.1) and December (51.4) had the highest rates of speed-related crashes per day.
- July (0.48) and May (0.42) had the highest rates per day of fatal speed-related crashes.

Speed-Related Crashes by Day of Week (Utah 2016)

Speed-Related Crashes								
Day of Week	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Sunday	940	12.2%	423	11.4%	19	19.4%	1,382	12.0%
Monday	1,305	16.9%	556	15.0%	12	12.2%	1,873	16.3%
Tuesday	1,002	13.0%	519	14.0%	9	9.2%	1,530	13.3%
Wednesday	973	12.6%	473	12.8%	11	11.2%	1,457	12.7%
Thursday	1,204	15.6%	567	15.3%	10	10.2%	1,781	15.5%
Friday	1,282	16.6%	616	16.7%	15	15.3%	1,913	16.6%
Saturday	1,008	13.1%	542	14.7%	22	22.4%	1,572	13.7%
Total	7,714	100.0%	3,696	100.0%	98	100.0%	11,508	100.0%

- The highest percentage of speed-related total crashes occurred on Friday and Monday while the highest percentage of fatal crashes occurred on Saturday and Sunday.
- Speed-related total crashes were lowest on Sunday and fatal crashes were lowest on Tuesday.

Crash Conditions

Speed-Related Crashes by Hour (Utah 2016)

Speed-Related Crashes								
Hour	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Midnight	171	2.2%	78	2.1%	3	3.1%	252	2.2%
1 a.m.	106	1.4%	90	2.4%	2	2.0%	198	1.7%
2 a.m.	91	1.2%	50	1.4%	3	3.1%	144	1.3%
3 a.m.	88	1.1%	52	1.4%	4	4.1%	144	1.3%
4 a.m.	87	1.1%	47	1.3%	2	2.0%	136	1.2%
5 a.m.	172	2.2%	59	1.6%	3	3.1%	234	2.0%
6 a.m.	346	4.5%	97	2.6%	1	1.0%	444	3.9%
7 a.m.	576	7.5%	183	5.0%	1	1.0%	760	6.6%
8 a.m.	572	7.4%	226	6.1%	2	2.0%	800	7.0%
9 a.m.	357	4.6%	137	3.7%	1	1.0%	495	4.3%
10 a.m.	278	3.6%	135	3.7%	4	4.1%	417	3.6%
11 a.m.	278	3.6%	159	4.3%	3	3.1%	440	3.8%
Noon	292	3.8%	145	3.9%	4	4.1%	441	3.8%
1 p.m.	317	4.1%	168	4.5%	16	16.3%	501	4.4%
2 p.m.	387	5.0%	220	6.0%	4	4.1%	611	5.3%
3 p.m.	493	6.4%	276	7.5%	7	7.1%	776	6.7%
4 p.m.	634	8.2%	325	8.8%	8	8.2%	967	8.4%
5 p.m.	747	9.7%	374	10.1%	6	6.1%	1,127	9.8%
6 p.m.	506	6.6%	258	7.0%	5	5.1%	769	6.7%
7 p.m.	300	3.9%	156	4.2%	6	6.1%	462	4.0%
8 p.m.	245	3.2%	116	3.1%	4	4.1%	365	3.2%
9 p.m.	254	3.3%	143	3.9%	3	3.1%	400	3.5%
10 p.m.	237	3.1%	109	2.9%	2	2.0%	348	3.0%
11 p.m.	180	2.3%	93	2.5%	4	4.1%	277	2.4%
Total	7,714	100.0%	3,696	100.0%	98	100.0%	11,508	100.0%

- Total speed-related crashes peaked in the morning (7:00 a.m. to 8:59 a.m.), with another peak in the late afternoon/evening (3:00 p.m. to 6:59 p.m.).
- Fatal speed-related crashes were highest during the 1:00 p.m., 4:00 p.m., and 5:00 p.m. hours.

Speed-Related Crashes by Speed Limit (Utah 2016)

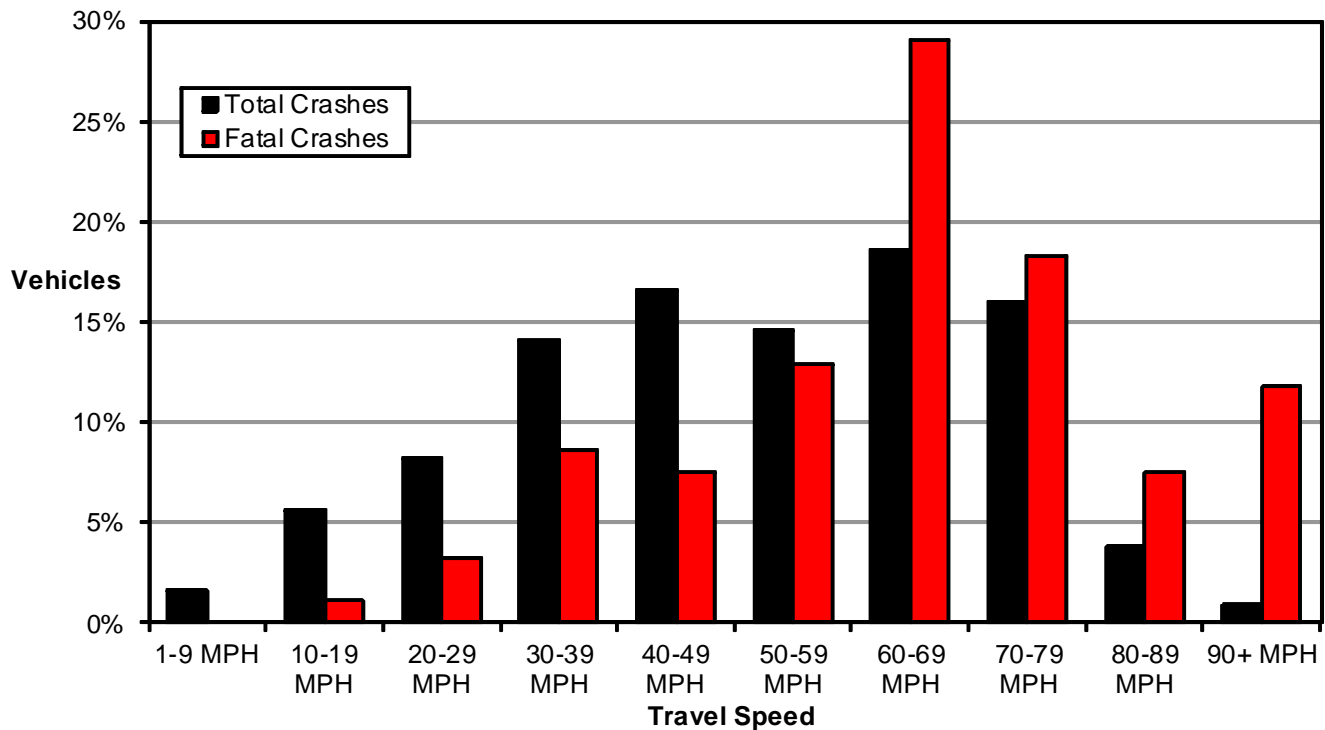
Speed-Related Vehicles								
Speed Limit	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
5-15 MPH	137	1.7%	48	1.2%	2	1.9%	187	1.5%
20-25 MPH	770	9.5%	409	10.4%	5	4.9%	1,184	9.8%
30-35 MPH	754	9.3%	505	12.9%	12	11.7%	1,271	10.5%
40-45 MPH	823	10.2%	472	12.0%	17	16.5%	1,312	10.8%
50-55 MPH	796	9.9%	458	11.7%	20	19.4%	1,274	10.5%
60-65 MPH	1,070	13.3%	472	12.0%	17	16.5%	1,559	12.9%
70-75 MPH	2,826	35.0%	1,169	29.8%	10	9.7%	4,005	33.1%
80 MPH	456	5.6%	177	4.5%	8	7.8%	641	5.3%
Unknown	440	5.5%	208	5.3%	12	11.7%	660	5.5%
Total	8,072	100.0%	3,918	100.0%	103	100.0%	12,093	100.0%

- When compared to all crashes, speed-related crashes were more likely to occur on roads with higher speed limits.
- 41% (of known) of total speed-related crashes occurred where the speed limit was 70 MPH or higher.

Crash Conditions

Speed-Related Crashes by Travel Speed (Utah 2016)

Speed-Related Vehicles								
Travel Speed	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
1-9 MPH	144	1.8%	33	0.8%	0	0.0%	177	1.5%
10-19 MPH	485	6.0%	137	3.5%	1	1.0%	623	5.2%
20-29 MPH	677	8.4%	233	5.9%	3	2.9%	913	7.5%
30-39 MPH	1,056	13.1%	511	13.0%	8	7.8%	1,575	13.0%
40-49 MPH	1,154	14.3%	693	17.7%	7	6.8%	1,854	15.3%
50-59 MPH	1,041	12.9%	574	14.7%	12	11.7%	1,627	13.5%
60-69 MPH	1,397	17.3%	648	16.5%	27	26.2%	2,072	17.1%
70-79 MPH	1,209	15.0%	560	14.3%	17	16.5%	1,786	14.8%
80-89 MPH	247	3.1%	174	4.4%	7	6.8%	428	3.5%
90+ MPH	35	0.4%	59	1.5%	11	10.7%	105	0.9%
Unknown	627	7.8%	296	7.6%	10	9.7%	933	7.7%
Total	8,072	100.0%	3,918	100.0%	103	100.0%	12,093	100.0%

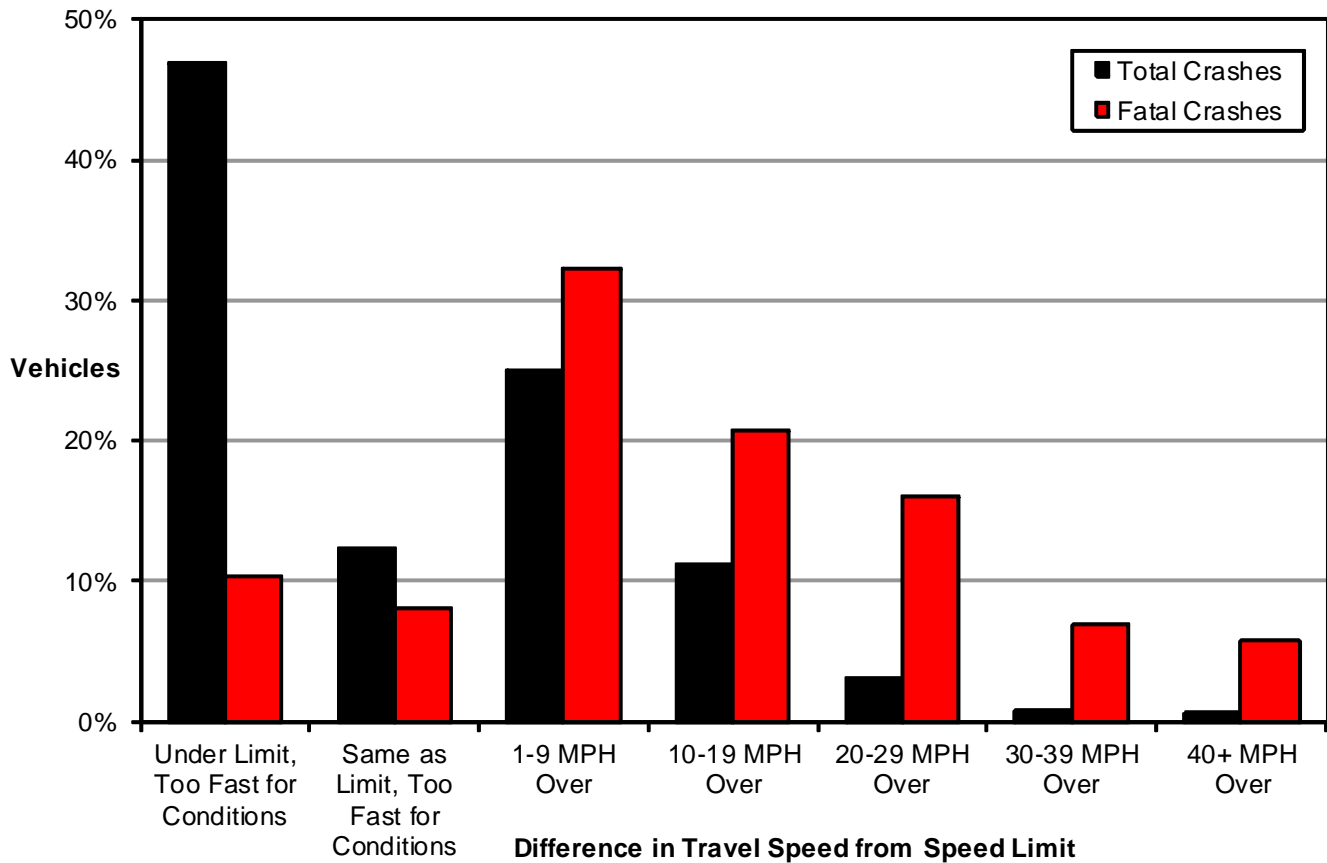


- 60-69 MPH (19% of known) and 40-49 MPH (17% of known) were the leading travel speeds of vehicles in total speed-related crashes.
- Two-thirds (67% of known) of vehicles in fatal speed-related crashes were traveling 60+ MPH.
- Speed-related vehicles in fatal crashes were more likely to be traveling at higher speeds. Speed-related vehicles in crashes traveling 80+ MPH were 4.9 times more likely to be in a fatal crash.
- The higher the speed the greater the amount of energy that must be absorbed in a crash, hence there is more likelihood of serious injury and death. The risk of death and severe injury is a direct exponential function of speed. Drivers become increased risks to themselves and other people on the highway due to higher speeds.
- Studies show that a 5% increase in average speed leads to a 10% increase in injury crashes and a 20% increase in fatal crashes. A 5% decrease in speed leads to a 10% decrease in injury crashes and a 20% decrease in fatal crashes.

Crash Conditions

Speed-Related Crashes by Difference in Travel Speed From Speed Limit (Utah 2016)

Speed-Related Vehicles								
Travel Speed vs. Speed Limit	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Under Limit, Too Fast for Conditions	3,768	46.7%	1,378	35.2%	9	8.7%	5,155	42.6%
Same as Limit, Too Fast for Conditions	944	11.7%	397	10.1%	7	6.8%	1,348	11.1%
1-9 MPH Over Speed Limit	1,710	21.2%	1,000	25.5%	28	27.2%	2,738	22.6%
10-19 MPH Over Speed Limit	688	8.5%	529	13.5%	18	17.5%	1,235	10.2%
20-29 MPH Over Speed Limit	165	2.0%	159	4.1%	14	13.6%	338	2.8%
30-39 MPH Over Speed Limit	35	0.4%	49	1.3%	6	5.8%	90	0.7%
40+ MPH Over Speed Limit	24	0.3%	50	1.3%	5	4.9%	79	0.7%
Unknown	738	9.1%	356	9.1%	16	15.5%	1,110	9.2%
Total	8,072	100.0%	3,918	100.0%	103	100.0%	12,093	100.0%



- 4,480 vehicles in crashes were known to be traveling over the posted speed limit.
- Speed-related vehicles in fatal crashes were more likely to be exceeding the posted speed limit by greater amounts.
- Speed-related vehicles in total crashes were more likely to be traveling too fast for conditions.
- Over three-fourths (82% of known) of speed-related vehicles in fatal crashes were traveling over the posted speed limit.
- Speed increases the crash energy by the square of the speeds. When impact speed increases from 40 to 60 MPH (a 50% increase), the energy that needs to be managed increases by 125%.

Alcohol



Choose your ride.
 Drink. Drive. Go to Jail.



Section 4: Alcohol

2

Trends

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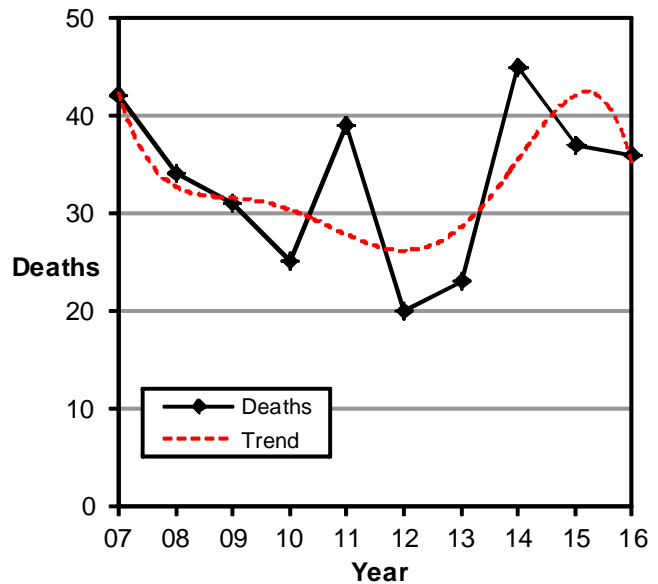
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Trends

Fatal Crashes Involving Drunk Drivers (Utah 2007-2016)

Drunk Driver Crashes						
Year	Deaths			Fatal Crashes		
	All	Alcohol	%	All	Alcohol	%
	#	#	%	#	#	%
2007	299	42	14.0%	260	37	14.2%
2008	276	34	12.3%	244	32	13.1%
2009	244	31	12.7%	217	28	12.9%
2010	253	25	9.9%	218	24	11.0%
2011	243	39	16.0%	224	33	14.7%
2012	217	20	9.2%	200	19	9.5%
2013	220	23	10.5%	202	23	11.4%
2014	256	45	17.6%	222	37	16.7%
2015	278	37	13.3%	258	31	12.0%
2016	281	36	12.8%	259	32	12.4%
Total	2,567	332	12.9%	2,304	296	12.8%



- Over the past 10 years, the percentage of deaths and fatal crashes involving drunk drivers has fluctuated around 13% of all deaths and fatal crashes.
- The 45 deaths involving drunk drivers in 2014 was the highest since 2004.
- On average, 33 people die a year in Utah from drunk driver crashes.

Deaths Involving Drunk Drivers (Utah 2007-2016)

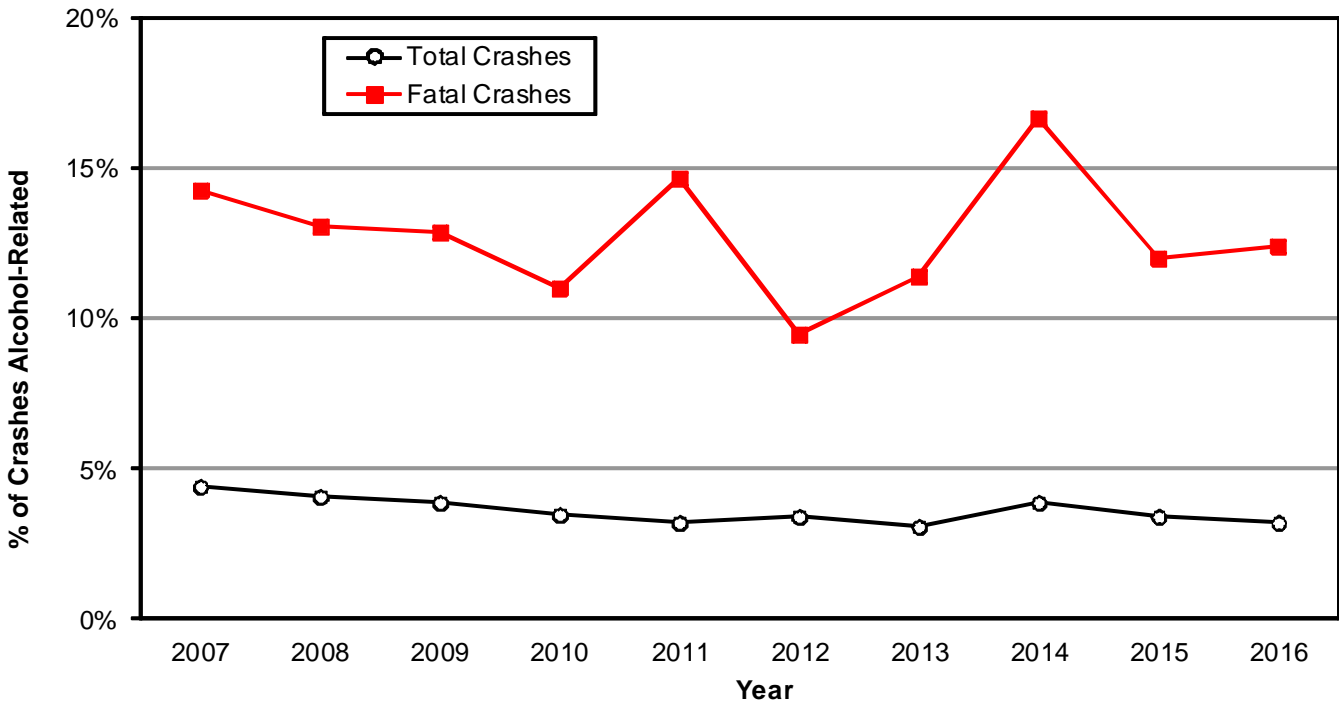
Deaths Involving Drunk Drivers by Person Type of Fatality														
Year	Drunk Driver		Passenger of Drunk Driver		Driver of Another Vehicle		Passenger of Another Vehicle		Pedestrian		Bicyclist		Total	
	#	%	#	%	#	%	#	%	#	%	#	%	#	%
2007	24	57.1%	9	21.4%	3	7.1%	4	9.5%	2	4.8%	0	0.0%	42	100.0%
2008	24	70.6%	8	23.5%	1	2.9%	1	2.9%	0	0.0%	0	0.0%	34	100.0%
2009	20	64.5%	6	19.4%	3	9.7%	1	3.2%	1	3.2%	0	0.0%	31	100.0%
2010	19	76.0%	3	12.0%	1	4.0%	0	0.0%	2	8.0%	0	0.0%	25	100.0%
2011	26	66.7%	7	17.9%	4	10.3%	1	2.6%	1	2.6%	0	0.0%	39	100.0%
2012	11	55.0%	3	15.0%	3	15.0%	3	15.0%	0	0.0%	0	0.0%	20	100.0%
2013	17	73.9%	4	17.4%	1	4.3%	0	0.0%	1	4.3%	0	0.0%	23	100.0%
2014	22	48.9%	8	17.8%	4	8.9%	5	11.1%	5	11.1%	1	2.2%	45	100.0%
2015	25	67.6%	6	16.2%	3	8.1%	1	2.7%	1	2.7%	1	2.7%	37	100.0%
2016	23	63.9%	5	13.9%	6	16.7%	2	5.6%	0	0.0%	0	0.0%	36	100.0%
Total	211	63.6%	59	17.8%	29	8.7%	18	5.4%	13	3.9%	2	0.6%	332	100.0%

- Of the 36 drunk driver crash deaths in 2016, 23 (64%) were to the drunk driver, 5 (14%) deaths were to passengers of the drunk driver, 8 (22%) were occupants of other vehicles, and 0 (0%) were non-motorists.
- Over the past 10 years, 64% of deaths involving drunk drivers were to the drunk driver, 18% of deaths were to passengers of the drunk driver, 14% of deaths were to occupants of another vehicle in the crash, and 4% were to non-motorists.

Trends

Alcohol-Related Driver Crashes (Utah 2007-2016)

Year	Property Damage Only			Injury			Fatal			Total		
	All	Alcohol		All	Alcohol		All	Alcohol		All	Alcohol	
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	1,441	3.4%	18,619	1,240	6.7%	258	37	14.3%	61,245	2,718	4.4%
2008	38,997	1,217	3.1%	17,125	1,081	6.3%	245	32	13.1%	56,367	2,330	4.1%
2009	35,398	1,108	3.1%	15,752	883	5.6%	217	28	12.9%	51,367	2,019	3.9%
2010	34,155	897	2.6%	14,995	802	5.3%	218	24	11.0%	49,368	1,723	3.5%
2011	36,418	910	2.5%	15,645	719	4.6%	224	33	14.7%	52,287	1,662	3.2%
2012	34,635	970	2.8%	15,765	738	4.7%	200	19	9.5%	50,600	1,727	3.4%
2013	39,301	953	2.4%	16,134	760	4.7%	202	23	11.4%	55,637	1,736	3.1%
2014	37,388	1,155	3.1%	16,426	938	5.7%	222	37	16.7%	54,036	2,130	3.9%
2015	42,089	1,160	2.8%	17,665	830	4.7%	258	31	12.0%	60,012	2,021	3.4%
2016	43,465	1,092	2.5%	18,747	846	4.5%	259	32	12.4%	62,471	1,970	3.2%
Total	384,214	10,903	2.8%	166,873	8,837	5.3%	2,303	296	12.9%	553,390	20,036	3.6%



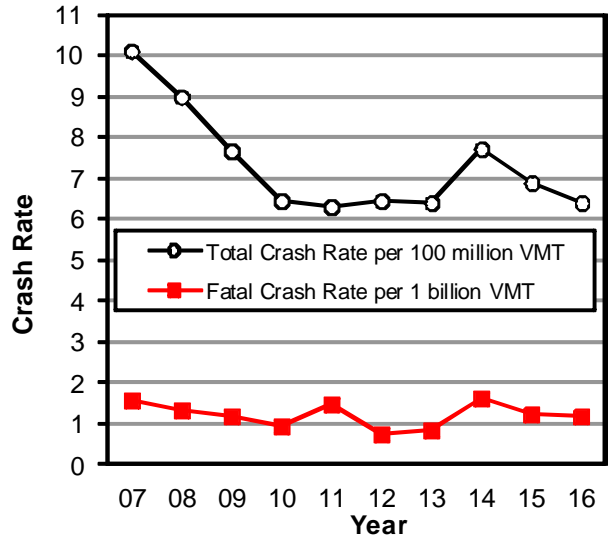
- Over the past 10 years, 3.6% of total crashes involved alcohol-related drivers compared with 12.9% of fatal crashes.
- Over the past 10 years, alcohol-related driver crashes were 3.9 times more likely to be fatal than crashes not involving an alcohol-related driver.

Note: A non-fatal crash is considered alcohol-related when the driver was cited for driving under the influence, at least one driver had a blood alcohol concentration of .08 grams per deciliter or above, or if the investigating officer suspected the driver used alcohol. A drunk driver fatal crash is a crash resulting in one or more deaths involving at least one driver with a blood alcohol concentration of .08 grams per deciliter or above.

Trends

Alcohol-Related Driver Crash Rates (Utah 2007-2016)

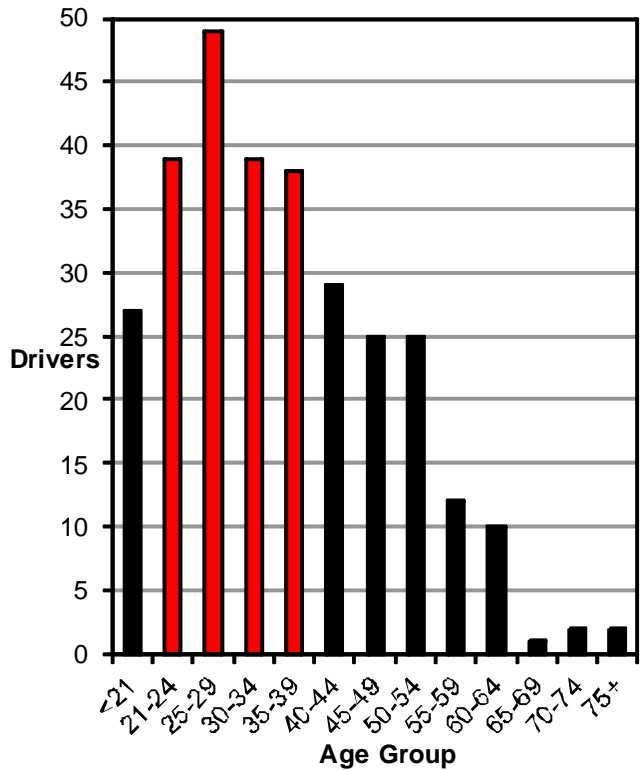
Alcohol-Related Driver Crashes				
Year	Alcohol Crashes		Alcohol Deaths	
	#	Rate per 100 million vehicle miles traveled	#	Rate per 100 million vehicle miles traveled
2007	2,718	10.13	42	0.157
2008	2,330	9.00	34	0.131
2009	2,019	7.70	31	0.118
2010	1,723	6.47	25	0.094
2011	1,662	6.30	39	0.148
2012	1,727	6.48	20	0.075
2013	1,736	6.43	23	0.085
2014	2,130	7.72	45	0.163
2015	2,021	6.88	37	0.126
2016	1,970	6.40	36	0.117
Total	20,036	7.33	332	0.121



- Over the past 10 years, the year 2007 had the highest rate (10.13) of alcohol crashes per 100 million vehicle miles traveled while the year 2011 had the lowest rate (6.30).
- Over the past 10 years, the year 2014 had the highest rate (0.163) of deaths involving a drunk driver per 100 million vehicle miles traveled while the year 2012 had the lowest rate (0.075).

Drunk Drivers in Fatal Crashes by Age (Utah 2007-2016)

Drunk Drivers in Fatal Crashes												
Age	Year										Total	
	07	08	09	10	11	12	13	14	15	16	#	%
<21	7	2	2	3	4	0	2	2	3	2	27	9.1%
21-24	5	4	3	3	6	2	1	5	5	5	39	13.1%
25-29	4	5	2	5	7	4	3	7	4	8	49	16.4%
30-34	2	6	3	5	5	2	4	2	6	4	39	13.1%
35-39	7	6	3	1	3	4	1	8	4	1	38	12.8%
40-44	3	3	6	3	0	1	4	4	2	3	29	9.7%
45-49	4	1	6	2	4	1	2	1	1	3	25	8.4%
50-54	3	3	1	2	2	2	1	5	5	1	25	8.4%
55-59	2	0	1	1	0	1	2	1	1	3	12	4.0%
60-64	0	1	1	0	1	2	2	2	0	1	10	3.4%
65-69	0	0	0	0	1	0	0	0	0	0	1	0.3%
70-74	0	1	0	0	0	0	0	0	0	1	2	0.7%
75+	0	1	0	0	0	0	1	0	0	0	2	0.7%
Unk	0	0	0	0	0	0	0	0	0	0	0	0.0%
Total	37	33	28	25	33	19	23	37	31	32	298	100.0%



- Over the past 10 years, drivers aged 21-39 years had the highest number of drunk drivers in fatal crashes.
- Over the past 10 years, drivers aged 55+ years had the lowest number of drunk drivers in fatal crashes.

Trends

Fatal Crashes Involving Drunk Drivers by County (Utah 2007-2016)

Fatal Crashes Involving Drunk Drivers												
County	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
Salt Lake	8	6	5	3	8	5	3	17	10	8	73	24.7%
Utah	4	5	0	2	1	1	3	2	3	3	24	8.1%
Tooele	3	3	1	1	0	3	1	1	0	6	19	6.4%
Summit	1	4	2	1	1	3	0	0	3	2	17	5.7%
Davis	1	2	1	3	2	0	2	2	1	1	15	5.1%
Weber	4	0	3	1	1	0	1	1	2	2	15	5.1%
Washington	0	5	1	0	0	1	2	1	1	2	13	4.4%
Duchesne	0	0	2	2	3	0	3	2	0	0	12	4.1%
San Juan	2	2	1	1	1	1	0	1	2	1	12	4.1%
Uintah	1	1	0	2	1	1	0	4	1	0	11	3.7%
Grand	0	0	3	2	1	1	1	0	2	0	10	3.4%
Carbon	2	0	0	0	3	0	1	1	1	1	9	3.0%
Millard	0	0	2	0	0	2	1	1	1	1	8	2.7%
Box Elder	2	0	1	1	0	0	0	1	1	1	7	2.4%
Cache	0	0	1	0	2	0	2	2	0	0	7	2.4%
Juab	3	0	0	2	1	0	1	0	0	0	7	2.4%
Emery	1	1	1	1	1	0	0	0	1	0	6	2.0%
Iron	2	0	0	1	2	0	1	0	0	0	6	2.0%
Morgan	0	2	0	0	2	0	0	0	0	0	4	1.4%
Wasatch	0	0	1	1	1	0	0	0	1	0	4	1.4%
Garfield	0	0	0	0	1	0	1	0	0	1	3	1.0%
Kane	0	1	1	0	0	0	0	0	0	1	3	1.0%
Sanpete	2	0	0	0	0	0	0	0	0	1	3	1.0%
Beaver	0	0	1	0	0	1	0	0	0	0	2	0.7%
Piute	1	0	0	0	1	0	0	0	0	0	2	0.7%
Rich	0	0	1	0	0	0	0	1	0	0	2	0.7%
Sevier	0	0	0	0	0	0	0	0	0	1	1	0.3%
Wayne	0	0	0	0	0	0	0	0	1	0	1	0.3%
Daggett	0	0	0	0	0	0	0	0	0	0	0	0.0%
Total	37	32	28	24	33	19	23	37	31	32	296	100.0%

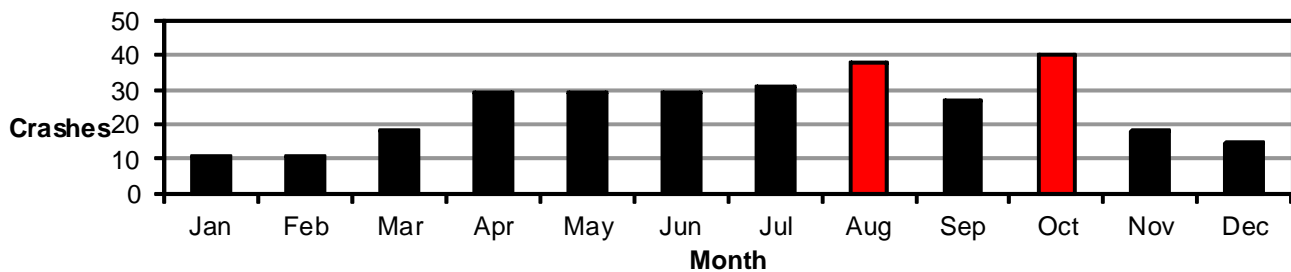
- Over the past 10 years, Salt Lake County accounted for nearly one-fourth (24.7%) of the fatal crashes involving drunk drivers.
- Salt Lake, Utah, Tooele, Summit, Davis, and Weber counties had the highest number of fatal crashes involving drunk drivers over the past 10 years.
- Daggett County had no fatal crashes involving drunk drivers over the past 10 years.



Trends

Fatal Crashes Involving Drunk Drivers by Month (Utah 2007-2016)

Fatal Crashes Involving Drunk Drivers												
Month	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
January	1	1	0	1	1	0	0	3	1	3	11	3.7%
February	1	3	0	0	1	1	2	0	2	1	11	3.7%
March	2	3	0	2	4	2	1	0	1	3	18	6.1%
April	4	2	3	2	3	2	4	4	4	1	29	9.8%
May	3	1	7	0	2	1	1	6	6	2	29	9.8%
June	4	3	3	3	4	2	2	2	4	2	29	9.8%
July	5	3	2	2	3	1	4	5	2	4	31	10.5%
August	3	5	5	5	4	2	2	3	4	5	38	12.8%
September	6	2	2	1	5	1	2	4	2	2	27	9.1%
October	5	2	4	5	4	3	3	5	3	6	40	13.5%
November	3	4	0	2	0	1	2	2	2	2	18	6.1%
December	0	3	2	1	2	3	0	3	0	1	15	5.1%
Total	37	32	28	24	33	19	23	37	31	32	296	100.0%



- Over the past 10 years, October and August were the months with the highest number of fatal crashes involving a drunk driver.
- Over the past 10 years, January and February had the lowest number of fatal crashes involving a drunk driver.

Fatal Crashes Involving Drunk Drivers by Day of Week (Utah 2007-2016)

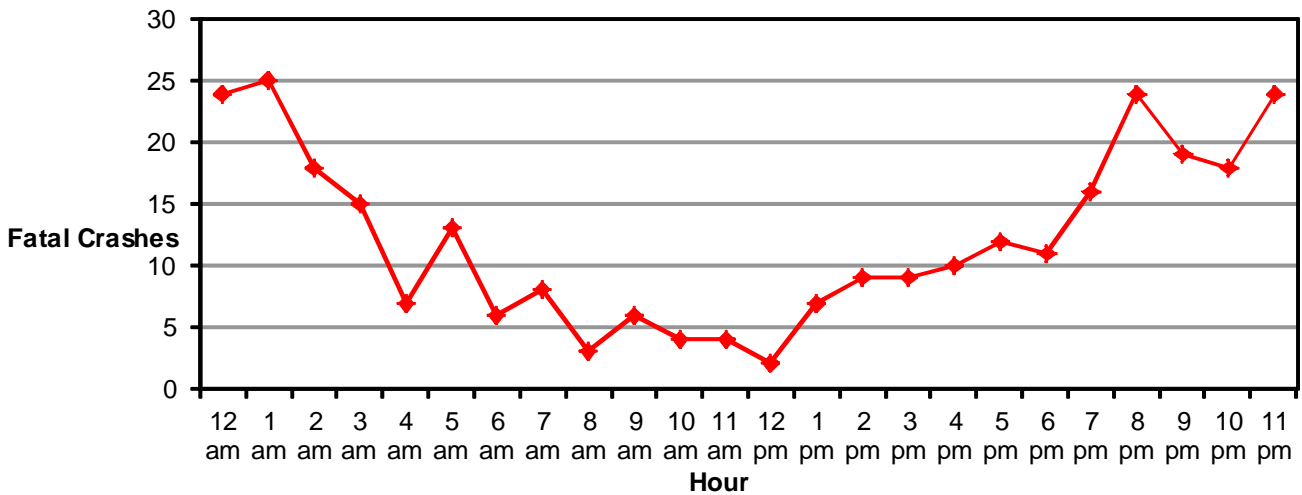
Fatal Crashes Involving Drunk Drivers												
Day of Week	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
Sunday	8	4	5	2	7	4	5	2	8	4	49	16.6%
Monday	2	2	6	6	1	0	2	4	0	4	27	9.1%
Tuesday	2	2	1	2	3	1	4	3	2	4	24	8.1%
Wednesday	4	3	4	2	3	2	3	2	4	2	29	9.8%
Thursday	3	7	3	3	8	0	3	7	4	5	43	14.5%
Friday	4	5	3	2	5	3	3	5	2	5	37	12.5%
Saturday	14	9	6	7	6	9	3	14	11	8	87	29.4%
Total	37	32	28	24	33	19	23	37	31	32	296	100.0%

- Over the past 10 years, Saturday and Sunday had the highest number of fatal crashes involving a drunk driver.
- Over the past 10 years, Tuesday and Monday had the lowest number of fatal crashes involving a drunk driver.

Trends

Fatal Crashes Involving Drunk Drivers by Hour (Utah 2007-2016)

Hour	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
Midnight	5	2	6	1	3	2	0	2	2	1	24	8.2%
1 a.m.	4	3	3	1	3	1	3	4	1	2	25	8.5%
2 a.m.	1	4	0	1	2	0	2	2	3	3	18	6.1%
3 a.m.	3	0	1	1	2	1	0	1	2	4	15	5.1%
4 a.m.	0	0	1	1	0	0	0	2	1	2	7	2.4%
5 a.m.	2	1	0	0	1	1	1	1	3	3	13	4.4%
6 a.m.	0	1	0	2	1	0	0	1	1	0	6	2.0%
7 a.m.	0	2	0	1	0	1	2	0	1	1	8	2.7%
8 a.m.	0	0	2	0	0	0	1	0	0	0	3	1.0%
9 a.m.	0	0	1	2	1	0	0	1	1	0	6	2.0%
10 a.m.	0	1	2	0	1	0	0	0	0	0	4	1.4%
11 a.m.	2	1	0	0	0	0	1	0	0	0	4	1.4%
Noon	0	2	0	0	0	0	0	0	0	0	2	0.7%
1 p.m.	0	0	2	0	0	0	1	2	0	2	7	2.4%
2 p.m.	1	0	0	2	0	1	1	2	0	2	9	3.1%
3 p.m.	1	1	1	1	1	1	0	0	0	3	9	3.1%
4 p.m.	0	0	1	0	3	1	0	1	3	1	10	3.4%
5 p.m.	0	0	1	1	2	2	1	1	3	1	12	4.1%
6 p.m.	1	0	1	0	1	0	1	4	3	0	11	3.7%
7 p.m.	2	2	0	2	3	1	1	2	0	3	16	5.4%
8 p.m.	4	3	4	2	2	2	3	4	0	0	24	8.2%
9 p.m.	4	4	1	1	3	0	1	2	1	2	19	6.5%
10 p.m.	3	2	1	1	2	2	3	2	2	0	18	6.1%
11 p.m.	3	2	0	4	2	3	1	3	4	2	24	8.2%
Total	36	31	28	24	33	19	23	37	31	32	294	100.0%



- Over the past 10 years, nighttime (8:00 p.m. –2:59 a.m.) had the highest number of fatal crashes involving a drunk driver.
- Over the past 10 years, mid-day (6:00 a.m.—3:59 p.m.) had the lowest number of fatal crashes involving a drunk driver.

Crash Conditions

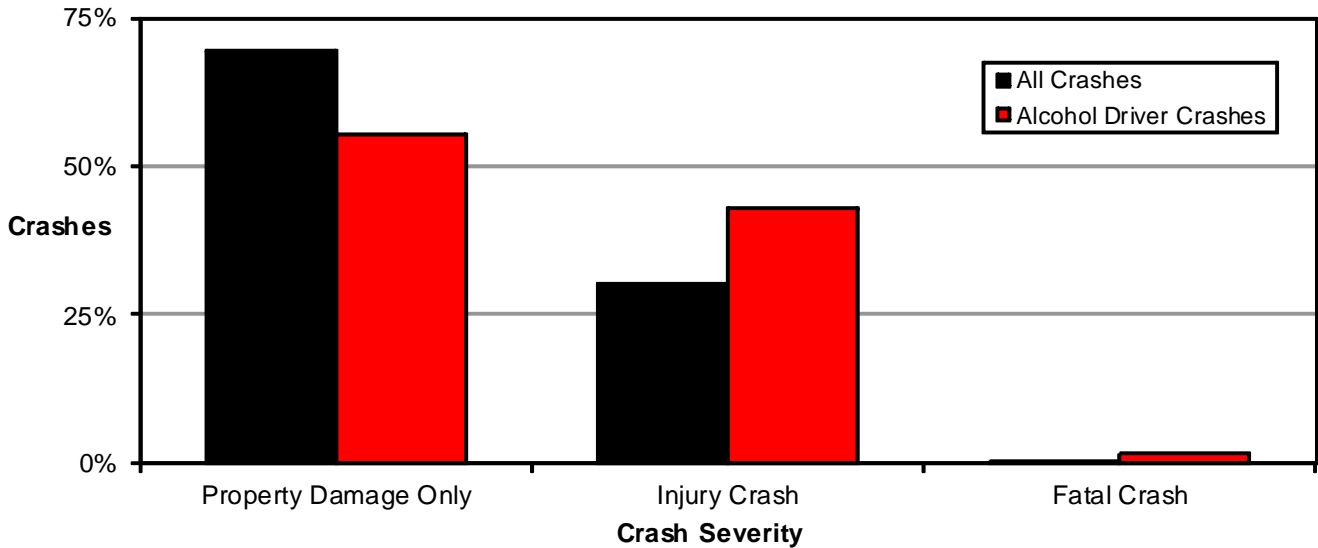
Alcohol-Related Driver Crashes by County (Utah 2016)

Alcohol-Related Driver Crashes								
County	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT
Salt Lake	603	6.1	384	3.9	8	0.08	995	10.1
Weber	88	4.9	65	3.6	2	0.11	155	8.6
Tooele	28	3.1	25	2.8	6	0.66	59	6.5
Wasatch	12	3.0	13	3.2	0	0.00	25	6.2
Washington	54	3.3	46	2.8	2	0.12	102	6.1
Summit	24	2.8	24	2.8	2	0.23	50	5.8
Sanpete	2	0.8	11	4.4	1	0.40	14	5.6
Cache	27	2.7	28	2.8	0	0.00	55	5.5
Wayne	1	1.8	2	3.7	0	0.00	3	5.5
Rich	2	3.6	1	1.8	0	0.00	3	5.5
Davis	72	2.4	60	2.0	1	0.03	133	4.5
Uintah	10	2.3	8	1.8	0	0.00	18	4.1
Sevier	6	1.6	8	2.2	1	0.27	15	4.1
Morgan	3	2.0	3	2.0	0	0.00	6	4.0
Garfield	1	0.8	3	2.3	1	0.77	5	3.8
Iron	15	1.8	17	2.0	0	0.00	32	3.8
Carbon	5	1.4	7	2.0	1	0.29	13	3.7
Duchesne	5	1.5	7	2.1	0	0.00	12	3.7
Utah	97	2.1	72	1.5	3	0.06	172	3.6
Beaver	6	2.0	5	1.7	0	0.00	11	3.6
Kane	0	0.0	5	3.0	1	0.60	6	3.6
Box Elder	11	1.1	23	2.3	1	0.10	35	3.5
Emery	5	1.3	8	2.1	0	0.00	13	3.3
Piute	1	3.1	0	0.0	0	0.00	1	3.1
Millard	5	0.9	8	1.4	1	0.18	14	2.5
San Juan	2	0.6	5	1.5	1	0.30	8	2.4
Juab	4	0.9	4	0.9	0	0.00	8	1.8
Grand	3	0.7	4	1.0	0	0.00	7	1.7
Daggett	0	0.0	0	0.0	0	0.00	0	0.0
Statewide	1,092	3.5	846	2.7	32	0.10	1,970	6.4

- Salt Lake (10.1), Weber (8.6), and Tooele (6.5) counties had the highest rates of alcohol-related driver total crashes per 100 million vehicle miles traveled.
- Daggett (0.0), Grand (1.7), and Juab (1.8) counties had the lowest rates of alcohol-related driver total crashes per 100 million vehicle miles traveled.
- Salt Lake County had over one-half (50.5%) of the fatal drunk driver crashes.

Crash Conditions

Alcohol-Related Driver Crash Severity (Utah 2016)



- Alcohol-related driver crashes were more likely to have a death or injury than other crashes.
- A higher percentage of alcohol-related driver crashes (42.9%) resulted in an injury compared to all motor vehicle crashes that resulted in an injury (30.0%).
- In addition, a higher percentage of alcohol-related driver crashes were fatal (1.6%) compared to all motor vehicle crashes (0.4%).

Alcohol-Related Driver Crashes by Month (Utah 2016)

Alcohol-Related Driver Crashes								
Month	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	107	3.5	69	2.2	3	0.10	179	5.8
February	74	2.6	57	2.0	1	0.03	132	4.6
March	80	2.6	63	2.0	3	0.10	146	4.7
April	91	3.0	72	2.4	1	0.03	164	5.5
May	80	2.6	65	2.1	2	0.06	147	4.7
June	86	2.9	77	2.6	2	0.07	165	5.5
July	90	2.9	75	2.4	4	0.13	169	5.5
August	86	2.8	82	2.6	5	0.16	173	5.6
September	83	2.8	76	2.5	2	0.07	161	5.4
October	96	3.1	74	2.4	6	0.19	176	5.7
November	114	3.8	60	2.0	2	0.07	176	5.9
December	105	3.4	76	2.5	1	0.03	182	5.9
Total	1,092	3.0	846	2.3	32	0.09	1,970	5.4

- Overall, the highest rates per day of alcohol-related driver crashes were in November (5.9) and December (5.9) with the lowest rate per day in February (4.6), March (4.7), and May (4.7).
- The highest rate per day of fatal drunk driver crashes occurred in October and August.

Crash Conditions

Alcohol-Related Driver Crashes by Day of Week (Utah 2016)

Alcohol-Related Driver Crashes								
Day of Week	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Sunday	221	20.2%	179	21.2%	4	12.5%	404	20.5%
Monday	111	10.2%	91	10.8%	4	12.5%	206	10.5%
Tuesday	103	9.4%	85	10.0%	4	12.5%	192	9.7%
Wednesday	97	8.9%	82	9.7%	2	6.3%	181	9.2%
Thursday	107	9.8%	104	12.3%	5	15.6%	216	11.0%
Friday	190	17.4%	128	15.1%	5	15.6%	323	16.4%
Saturday	263	24.1%	177	20.9%	8	25.0%	448	22.7%
Total	1,092	100.0%	846	100.0%	32	100.0%	1,970	100.0%

- The highest amount of alcohol-related driver total crashes occurred on Saturday and Sunday.
- The highest amount of drunk driver fatal crashes occurred on Saturday.

Alcohol-Related Driver Crashes by Hour (Utah 2016)

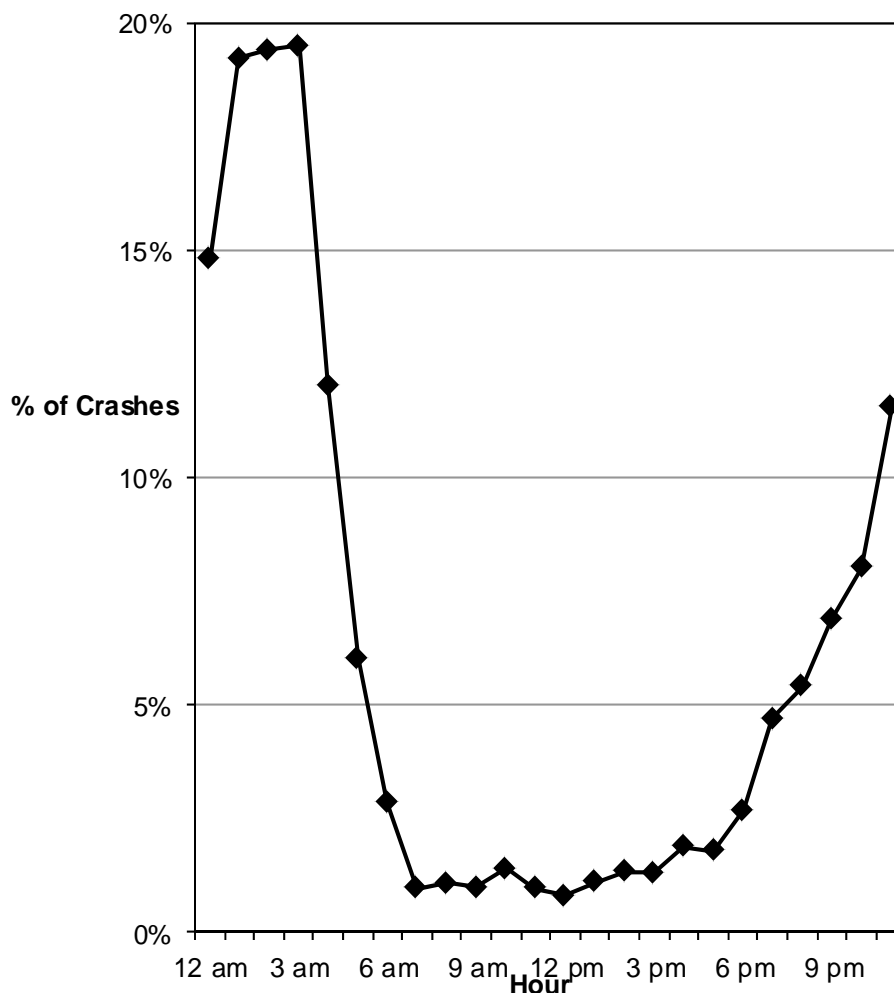
Alcohol-Related Driver Crashes								
Hour	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Midnight	78	7.1%	68	8.0%	1	3.1%	147	7.5%
1 a.m.	66	6.0%	59	7.0%	2	6.3%	127	6.4%
2 a.m.	62	5.7%	34	4.0%	3	9.4%	99	5.0%
3 a.m.	49	4.5%	36	4.3%	4	12.5%	89	4.5%
4 a.m.	30	2.7%	25	3.0%	2	6.3%	57	2.9%
5 a.m.	26	2.4%	21	2.5%	3	9.4%	50	2.5%
6 a.m.	31	2.8%	16	1.9%	0	0.0%	47	2.4%
7 a.m.	12	1.1%	17	2.0%	1	3.1%	30	1.5%
8 a.m.	23	2.1%	15	1.8%	0	0.0%	38	1.9%
9 a.m.	18	1.6%	8	0.9%	0	0.0%	26	1.3%
10 a.m.	20	1.8%	13	1.5%	0	0.0%	33	1.7%
11 a.m.	11	1.0%	16	1.9%	0	0.0%	27	1.4%
Noon	15	1.4%	12	1.4%	0	0.0%	27	1.4%
1 p.m.	20	1.8%	16	1.9%	2	6.3%	38	1.9%
2 p.m.	27	2.5%	24	2.8%	2	6.3%	53	2.7%
3 p.m.	31	2.8%	28	3.3%	3	9.4%	62	3.1%
4 p.m.	51	4.7%	46	5.4%	1	3.1%	98	5.0%
5 p.m.	65	6.0%	47	5.6%	1	3.1%	113	5.7%
6 p.m.	70	6.4%	58	6.9%	0	0.0%	128	6.5%
7 p.m.	77	7.1%	64	7.6%	3	9.4%	144	7.3%
8 p.m.	74	6.8%	46	5.4%	0	0.0%	120	6.1%
9 p.m.	69	6.3%	76	9.0%	2	6.3%	147	7.5%
10 p.m.	82	7.5%	51	6.0%	0	0.0%	133	6.8%
11 p.m.	85	7.8%	50	5.9%	2	6.3%	137	7.0%
Total	1,092	100.0%	846	100.0%	32	100.0%	1,970	100.0%

- Alcohol-related driver total crashes peaked in the evening and early morning hours (6:00 p.m. to 1:59 a.m.).
- Fatal drunk driver crashes were highest during the 3 a.m. hour.

Crash Conditions

Percent of Total Crashes with an Alcohol-Related Driver by Hour (Utah 2016)

Alcohol-Related Driver Crashes			
Hour	Total Crashes		
	All #	Alcohol #	%
Midnight	993	147	14.8%
1 a.m.	660	127	19.2%
2 a.m.	510	99	19.4%
3 a.m.	456	89	19.5%
4 a.m.	474	57	12.0%
5 a.m.	829	50	6.0%
6 a.m.	1,639	47	2.9%
7 a.m.	3,169	30	0.9%
8 a.m.	3,576	38	1.1%
9 a.m.	2,671	26	1.0%
10 a.m.	2,379	33	1.4%
11 a.m.	2,843	27	0.9%
Noon	3,347	27	0.8%
1 p.m.	3,504	38	1.1%
2 p.m.	3,977	53	1.3%
3 p.m.	4,790	62	1.3%
4 p.m.	5,252	98	1.9%
5 p.m.	6,365	113	1.8%
6 p.m.	4,761	128	2.7%
7 p.m.	3,072	144	4.7%
8 p.m.	2,220	120	5.4%
9 p.m.	2,140	147	6.9%
10 p.m.	1,657	133	8.0%
11 p.m.	1,187	137	11.5%
Total	62,471	1,970	3.2%



- While 3.2% of total crashes were alcohol-related, 15.3% of the crashes occurring during the hours of 11:00 p.m.-4:59 a.m. were alcohol-related.

Persons in Alcohol-Related Driver Crashes (Utah 2016)

Persons (Alcohol-Related Driver Crashes)								
Person Type	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Driver	2,190	73.5%	897	73.5%	29	80.6%	3,116	73.6%
Passenger	786	26.4%	315	25.8%	7	19.4%	1,108	26.2%
Pedestrian	4	0.1%	7	0.6%	0	0.0%	11	0.3%
Bicyclist	0	0.0%	1	0.1%	0	0.0%	1	0.0%
Total	2,980	100.0%	1,220	100.0%	36	100.0%	4,236	100.0%

- Of the 4,236 people in alcohol-related driver crashes, 73.6% were drivers, 26.2% were passengers, and 0.3% were non-motorists.

Crash Conditions

Alcohol-Related Crashes by Day of Week and Hour (Utah 2016)

Alcohol-Related Driver Crashes								
Hour	Day of Week							Total #
	Sun	Mon	Tue	Wed	Thu	Fri	Sat	
Midnight	45	12	14	12	13	17	34	147
1 a.m.	35	4	9	12	13	17	37	127
2 a.m.	30	10	7	7	3	13	30	100
3 a.m.	29	10	3	3	8	8	28	89
4 a.m.	13	5	6	3	5	6	19	57
5 a.m.	22	4	4	3	2	7	8	50
6 a.m.	18	4	3	2	4	5	11	47
7 a.m.	7	3	4	2	2	5	7	30
8 a.m.	6	4	4	1	6	7	11	39
9 a.m.	9	3	3	1	1	7	3	27
10 a.m.	4	3	6	5	9	3	4	34
11 a.m.	5	4	4	2	4	1	7	27
Noon	6	2	2	1	4	7	6	28
1 p.m.	6	5	4	2	3	9	7	36
2 p.m.	6	10	6	6	7	6	11	52
3 p.m.	11	6	6	5	9	11	14	62
4 p.m.	13	14	10	12	10	23	16	98
5 p.m.	10	18	17	16	13	22	19	115
6 p.m.	18	12	16	18	20	24	20	128
7 p.m.	26	9	19	18	22	26	25	145
8 p.m.	24	13	11	10	17	23	23	121
9 p.m.	22	16	14	18	18	27	31	146
10 p.m.	20	19	8	11	11	26	38	133
11 p.m.	20	17	10	12	10	24	43	136
Total	405	207	190	182	214	324	452	1,974

High = 17+
Medium = 9-16
Low = 0-8

- Alcohol-related crashes were highest from Friday 4:00 p.m. to Saturday 4:59 a.m., Saturday 5:00 p.m. to Sunday 3:59 a.m., and Sunday 6:00 p.m. to 11:59 p.m. This is in contrast to when most crashes occur Monday through Saturday 2:00 p.m. to 6:59 p.m.

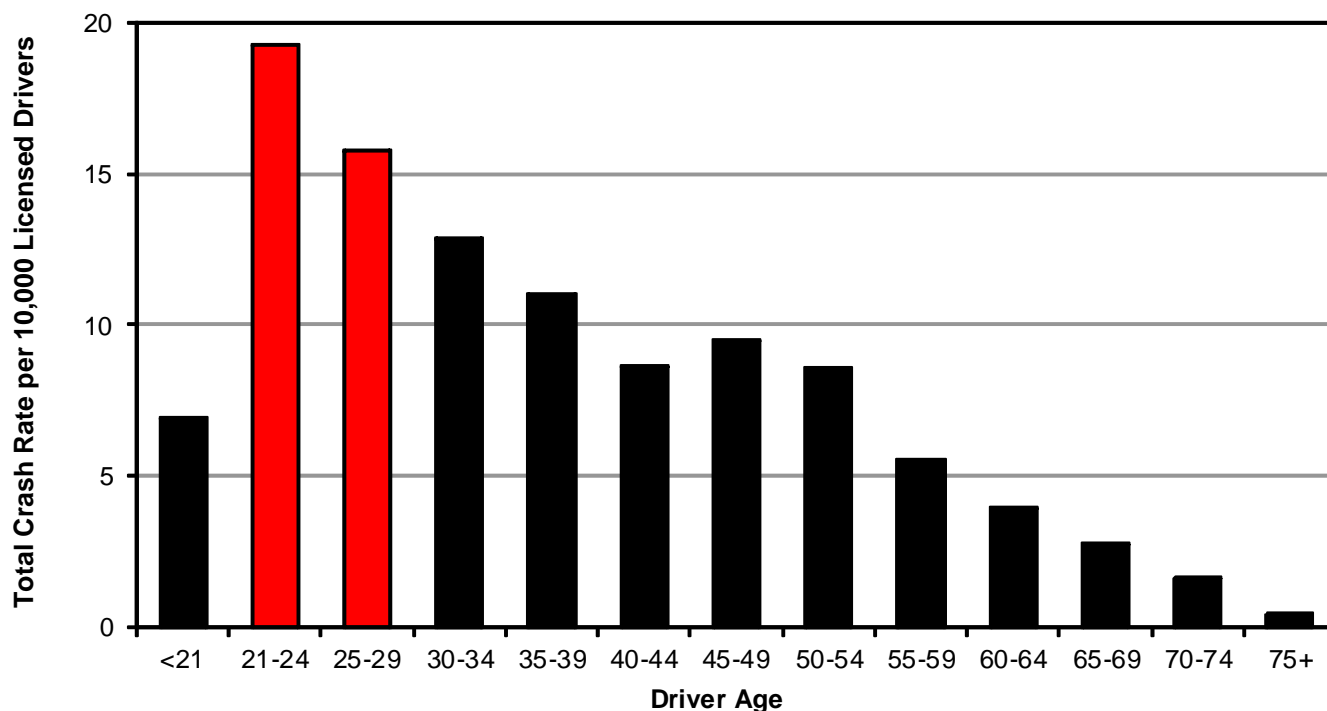
Previous Driving Under the Influence Convictions of Drunk Drivers in Fatal Crashes (Utah 2016)

- Of the 32 drunk drivers in fatal crashes, three drivers (9.4%) had been previously convicted of driving under the influence in the past five years.

Crash Conditions

Age of Alcohol-Related Drivers in Crashes (Utah 2016)

Age	Alcohol-Related Drivers											
	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	#	%	Rate per 10,000 Drivers	#	%	Rate per 10,000 Drivers	#	%	Rate per 10,000 Drivers	#	%	Rate per 10,000 Drivers
<21	89	8.1%	3.9	66	7.7%	2.9	2	6.3%	0.09	157	7.9%	6.9
21-24	174	15.8%	10.0	155	18.1%	8.9	5	15.6%	0.29	334	16.8%	19.3
25-29	185	16.8%	8.6	148	17.3%	6.9	8	25.0%	0.37	341	17.2%	15.8
30-34	155	14.1%	7.6	105	12.3%	5.1	4	12.5%	0.20	264	13.3%	12.9
35-39	137	12.5%	6.5	95	11.1%	4.5	1	3.1%	0.05	233	11.7%	11.0
40-44	84	7.7%	4.6	69	8.1%	3.8	3	9.4%	0.17	156	7.9%	8.6
45-49	86	7.8%	5.6	58	6.8%	3.7	3	9.4%	0.19	147	7.4%	9.5
50-54	61	5.6%	4.4	57	6.7%	4.1	1	3.1%	0.07	119	6.0%	8.6
55-59	36	3.3%	2.5	41	4.8%	2.8	3	9.4%	0.21	80	4.0%	5.5
60-64	29	2.6%	2.2	22	2.6%	1.7	1	3.1%	0.08	52	2.6%	3.9
65-69	19	1.7%	1.8	11	1.3%	1.0	0	0.0%	0.00	30	1.5%	2.8
70-74	5	0.5%	0.6	7	0.8%	0.9	1	3.1%	0.13	13	0.7%	1.6
75+	1	0.1%	0.1	4	0.5%	0.4	0	0.0%	0.00	5	0.3%	0.4
Unknown	37	3.4%	n/a	18	2.1%	n/a	0	0.0%	n/a	55	2.8%	n/a
Total	1,098	100.0%	5.3	856	100.0%	4.1	32	100.0%	0.15	1,986	100.0%	9.5



- Drivers aged 21-29 years had the highest rate of total alcohol-related driver crashes.
- Drivers aged 21-29 years had the highest rate of drunk driver fatal crashes.
- 157 (7.9%) of the alcohol-related drivers in total crashes were under the age of 21 years.
- Two of the 32 (6.3%) drunk drivers in fatal crashes were under the age of 21 years.
- There is a rapid decline of alcohol-related drivers as age increases with less than 10% of alcohol-related drivers over the age of 55 years (9.3%).

Crash Conditions

Gender of Alcohol-Related Drivers in Crashes (Utah 2016)

Alcohol-Related Drivers								
Gender	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Male	786	71.6%	644	75.2%	24	75.0%	1,454	73.2%
Female	284	25.9%	200	23.4%	8	25.0%	492	24.8%
Unknown	28	2.6%	12	1.4%	0	0.0%	40	2.0%
Total	1,098	100.0%	856	100.0%	32	100.0%	1,986	100.0%

- Male drivers were much more likely to be an alcohol-related driver in a crash. Male drivers represented 73.2% of the alcohol-related drivers in total crashes and 75.0% of drunk drivers in fatal crashes.

Alcohol-Related Crashes by Vehicle Type (Utah 2016)

Alcohol-Related Vehicles												
Vehicle Type	Property Damage Only			Injury			Fatal			Total		
	All	Alcohol		All	Alcohol		All	Alcohol		All	Alcohol	
	#	#	%	#	#	%	#	#	%	#	#	%
Off Road Vehicle	35	0	0.0%	146	12	8.2%	9	0	0.0%	190	12	6.3%
Motorcycle	175	2	1.1%	972	37	3.8%	41	5	12.2%	1,188	44	3.7%
Pickup Truck	12,891	235	1.8%	5,016	163	3.2%	81	8	9.9%	17,988	406	2.3%
Passenger Car	40,778	625	1.5%	18,918	441	2.3%	151	12	7.9%	59,847	1,078	1.8%
RV/Motorhome	94	2	2.1%	24	0	0.0%	1	0	0.0%	119	2	1.7%
SUV	17,169	193	1.1%	7,925	173	2.2%	78	6	7.7%	25,172	372	1.5%
Van	4,128	33	0.8%	2,080	23	1.1%	13	1	7.7%	6,221	57	0.9%
Heavy Truck	2,917	7	0.2%	767	7	0.9%	26	0	0.0%	3,710	14	0.4%
Bus	344	0	0.0%	73	0	0.0%	1	0	0.0%	418	0	0.0%
Other	43	0	0.0%	13	0	0.0%	2	0	0.0%	58	0	0.0%
Unknown	1,241	1	0.1%	192	0	0.0%	8	0	0.0%	1,441	1	0.1%
Total	79,815	1,098	1.4%	36,126	856	2.4%	411	32	7.8%	116,352	1,986	1.7%

- Off Road Vehicle and motorcycle had the highest % of vehicles in a crash driven by an alcohol-related driver.

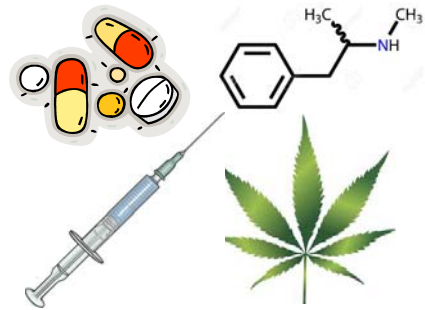
Drivers in Fatal Crashes by Blood Alcohol Concentration (BAC) (Utah 2016)

All Drivers in Fatal Crashes			
BAC	Drivers		
	#	%	% of Tested
.00	191	47.5%	84.1%
.01 - .07	4	1.0%	1.8%
.08 - .15	11	2.7%	4.8%
.16 - .23	15	3.7%	6.6%
.24 - .31	3	0.7%	1.3%
.32+	3	0.7%	1.3%
Not Tested/Unknown	175	43.5%	n/a
Total	402	100.0%	

Drunk Drivers in Fatal Crashes		
BAC	Drivers	
	#	%
.08 - .15	11	34.4%
.16 - .23	15	46.9%
.24 - .31	3	9.4%
.32+	3	9.4%
Total	32	100.0%

- Of the 227 drivers in fatal crashes who were tested for alcohol, 84% had a BAC of 0.00, 2% had a BAC of 0.01-0.07, and 14% were over the legal limit of 0.08. 21 of the 32 (66%) drivers in fatal crashes who tested over the legal limit for alcohol had BAC levels at or above twice the legal limit of 0.08.

Drugs



2

Section 5: Drugs

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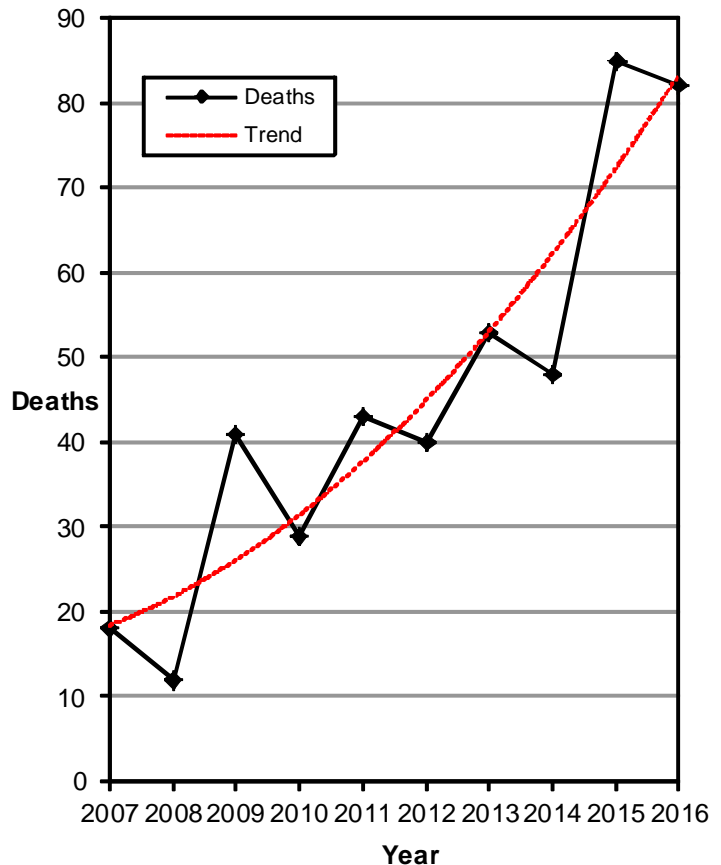
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6

Trends

Fatal Crashes Involving Drug Positive Drivers (Utah 2007-2016)

Year	Deaths			Fatal Crashes		
	All	Drug		All	Drug	
	#	#	%	#	#	%
2007	299	18	6.0%	260	17	6.5%
2008	276	12	4.3%	244	9	3.7%
2009	244	41	16.8%	217	28	12.9%
2010	253	29	11.5%	218	22	10.1%
2011	243	43	17.7%	224	37	16.5%
2012	217	40	18.4%	200	36	18.0%
2013	220	53	24.1%	202	51	25.2%
2014	256	48	18.8%	222	36	16.2%
2015	278	85	30.6%	258	75	29.1%
2016	281	82	29.2%	259	77	29.7%
Total	2,567	451	17.6%	2,304	388	16.8%



- A drug-positive driver was involved in over one-fourth (29.2%) of the traffic deaths in 2016.
- Deaths and fatal crashes involving drug positive drivers have increased over the last eight years.
- On average, 45 people die a year in Utah in drug positive driver crashes.
- An important distinction to make when evaluating drugged driving data is the mere presence of a drug in a person's system, as compared to the person being impaired by a drug in his/her system. Drug test data provides information about drug presence, rather than whether the driver was impaired by a drug at the time of a crash. Data identifying a driver as "drug positive" indicates only that a drug was in his/her system at the time of the crash. It does not indicate that a person was impaired by the drug. Thus, knowing that a driver tested positive for drugs does not necessarily indicate that the person was impaired by the drug at the time of the crash.

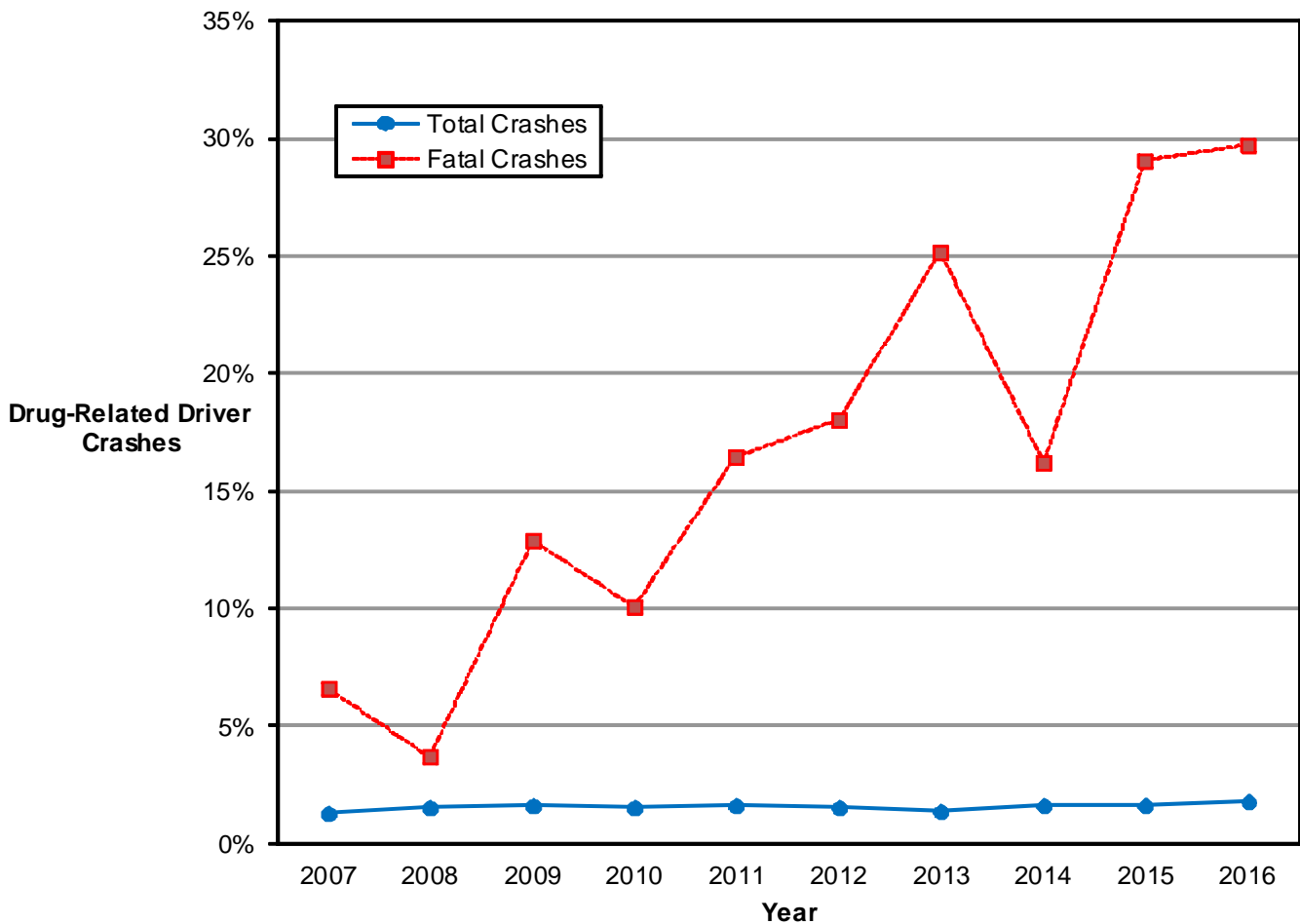
Note: A non-fatal crash is considered drug-related when the driver was cited for driving under the influence of drugs, at least one driver had a positive drug test, or if the investigating officer suspected the driver used drugs. A drug-positive driver fatal crash is a crash resulting in one or more deaths involving at least one driver with a positive drug test.

Drug presence does not necessarily imply impairment. For many drug types, drug presence can be detected long after any impairment that might affect driving has passed. Also, whereas the impairment effects for various concentration levels of alcohol is well understood, little evidence is available to link concentrations of other drug types to driver performance.

Trends

Drug-Related Driver Crashes (Utah 2007-2016)

Year	Property Damage Only			Injury			Fatal			Total		
	All	Drug		All	Drug		All	Drug		All	Drug	
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	379	0.9%	18,619	387	2.1%	258	17	6.6%	61,245	783	1.3%
2008	38,997	383	1.0%	17,125	433	2.5%	245	9	3.7%	56,367	825	1.5%
2009	35,398	394	1.1%	15,752	390	2.5%	217	28	12.9%	51,367	812	1.6%
2010	34,155	361	1.1%	14,995	360	2.4%	218	22	10.1%	49,368	743	1.5%
2011	36,418	416	1.1%	15,645	378	2.4%	224	37	16.5%	52,287	831	1.6%
2012	34,635	352	1.0%	15,765	377	2.4%	200	36	18.0%	50,600	765	1.5%
2013	39,301	356	0.9%	16,134	363	2.2%	202	51	25.2%	55,637	770	1.4%
2014	37,388	409	1.1%	16,426	435	2.6%	222	36	16.2%	54,036	880	1.6%
2015	42,089	500	1.2%	17,665	411	2.3%	258	75	29.1%	60,012	986	1.6%
2016	43,465	548	1.3%	18,747	486	2.6%	259	77	29.7%	62,471	1,111	1.8%
Total	384,214	4,098	1.1%	166,873	4,020	2.4%	2,303	388	16.8%	553,390	8,506	1.5%



- Over the past 10 years, 1.5% of total crashes involved drug-related drivers compared with 16.8% of fatal crashes.
- Over the past 10 years, drug-related driver crashes were 13 times more likely to be fatal than crashes not involving a drug-related driver.

Trends

Drug Positive Driver Test Results in Fatal Crashes (Utah 2007-2016)

Drug Positive Driver Test Results in Fatal Crashes (presence of a drug does not equal impairment)											
Drug Type	Year										Total
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	
Marijuana/THC	5	4	6	7	15	11	10	21	38	26	143
Methamphetamine	3	1	5	4	10	13	13	5	17	14	85
Amphetamine	1	0	0	0	2	5	9	0	3	6	26
Oxycodone	1	0	4	1	4	3	2	4	3	4	26
Depressant, Type Unknown	0	0	1	3	0	0	0	0	5	13	22
Hydrocodone	1	0	0	0	0	3	5	4	5	4	22
Diazepam	1	1	3	0	2	3	2	1	3	2	18
Narcotics, Type Unknown	0	0	0	1	0	0	0	0	3	10	14
Nordiazepam	0	0	2	1	1	3	3	1	3	0	14
Cocaine	2	0	0	1	2	1	1	2	2	1	12
Morphine	0	0	3	1	1	0	3	2	2	0	12
Alprazolam	0	0	1	0	0	1	1	2	1	4	10
Meprobamate	1	0	1	1	1	0	3	0	1	1	9
Zolpidem	0	1	1	0	0	1	2	1	1	2	9
Benzoyllecgonine	1	0	1	0	0	1	3	0	1	1	8
Heroin	0	0	0	0	1	0	0	0	0	5	6
Lorazepam	0	0	0	0	1	0	0	0	2	3	6
Methadone	2	0	0	0	0	0	1	0	0	1	4
Carisoprodol	0	0	0	0	0	0	1	0	2	0	3
Clonazepam	0	0	0	0	0	0	0	0	1	2	3
Fentanyl	0	0	0	0	0	0	1	0	0	2	3
Ketamine	0	0	0	1	0	0	0	0	0	2	3
Butalbital	0	0	0	0	0	0	0	0	0	2	2
Codeine	1	0	0	0	0	0	0	0	1	0	2
Hallucinogens, Type Unknown	0	0	0	0	0	0	0	0	2	0	2
Oxmorphone	0	0	0	0	0	0	0	1	0	1	2
Phenobarbital	0	0	0	0	1	0	0	1	0	0	2
Temazepam	0	0	1	0	0	1	0	0	0	0	2
Benzodiazepenes	0	0	0	0	0	0	0	0	0	1	1
Cyprenorphine	0	0	0	0	0	0	0	1	0	0	1
Diethyltryptamine (DET)	0	0	0	0	0	1	0	0	0	0	1
Meperidine	0	0	0	0	0	0	0	0	0	1	1
Midazolam	0	0	0	0	0	0	0	0	1	0	1
Morpheridine	0	0	0	0	0	1	0	0	0	0	1
Oxazepam	0	0	0	0	0	0	0	0	0	1	1
Propoxyphene	0	0	1	0	0	0	0	0	0	0	1
Zolazepam (Telazol)	0	0	0	0	1	0	0	0	0	0	1
Other Drug	4	1	1	1	2	4	23	7	17	9	69
Unknown Type	1	1	1	3	4	5	2	1	0	2	20
Total	24	9	32	25	48	57	85	54	114	120	568

- Over the past 10 years, Marijuana/ THC had the highest amount of positive test results of all drugs. Methamphetamine, Amphetamine, and Oxycodone were the next highest drug positive test results in fatalities.
- In 2014, Marijuana/ THC saw a dramatic increase in positive test results in fatal crashes. The increase was even higher in 2015. The 38 positive test results in 2015 were higher than the years 2011-2013 combined. 2016 continued the high number of positive marijuana/ THC drug tests in fatal crashes.



Trends

Fatal Crashes Involving Drug Positive Drivers by County (Utah 2007-2016)

Fatal Crashes Involving Drug Positive Drivers (presence of a drug does not equal impairment)												
County	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
Salt Lake	4	1	8	8	13	11	15	11	20	16	107	27.6%
Utah	1	2	3	6	2	4	5	2	9	10	44	11.3%
Weber	2	1	1	0	5	2	6	1	9	11	38	9.8%
Davis	1	1	2	2	1	3	2	2	4	9	27	7.0%
Tooele	1	0	1	1	2	2	7	1	4	5	24	6.2%
Washington	1	2	3	0	1	3	4	3	1	5	23	5.9%
Box Elder	2	0	1	0	0	0	1	3	5	1	13	3.4%
Uintah	0	0	1	0	2	4	1	2	2	1	13	3.4%
Duchesne	0	0	3	0	2	0	3	3	0	0	11	2.8%
Summit	0	0	0	0	1	2	0	2	2	3	10	2.6%
Iron	1	0	0	2	0	0	1	2	0	3	9	2.3%
Cache	0	0	1	0	0	2	1	1	0	3	8	2.1%
Carbon	0	0	1	0	3	0	1	1	2	0	8	2.1%
Emery	1	0	0	1	0	1	0	0	3	1	7	1.8%
Millard	0	1	0	0	1	0	1	0	2	2	7	1.8%
Wasatch	1	0	0	0	1	0	0	0	5	0	7	1.8%
Juab	2	0	0	1	1	0	0	0	0	1	5	1.3%
Sanpete	0	0	0	0	1	0	0	1	1	2	5	1.3%
Grand	0	0	1	1	0	0	0	0	2	0	4	1.0%
San Juan	0	1	1	0	0	0	0	1	1	0	4	1.0%
Sevier	0	0	0	0	0	1	1	0	0	2	4	1.0%
Garfield	0	0	0	0	1	0	1	0	0	1	3	0.8%
Daggett	0	0	0	0	0	1	0	0	0	1	2	0.5%
Kane	0	0	0	0	0	0	0	0	2	0	2	0.5%
Beaver	0	0	1	0	0	0	0	0	0	0	1	0.3%
Morgan	0	0	0	0	0	0	0	0	1	0	1	0.3%
Wayne	0	0	0	0	0	0	1	0	0	0	1	0.3%
Piute	0	0	0	0	0	0	0	0	0	0	0	0.0%
Rich	0	0	0	0	0	0	0	0	0	0	0	0.0%
Total	17	9	28	22	37	36	51	36	75	77	388	100.0%

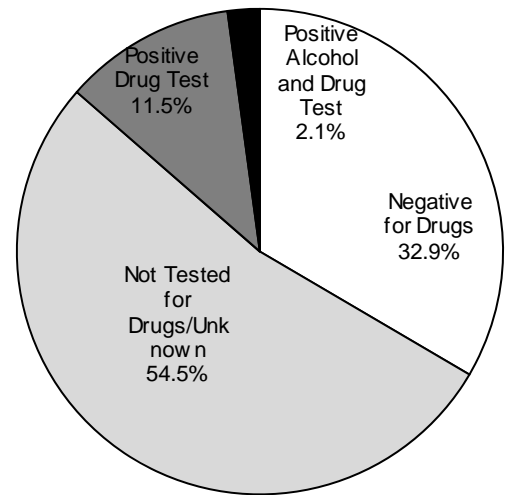
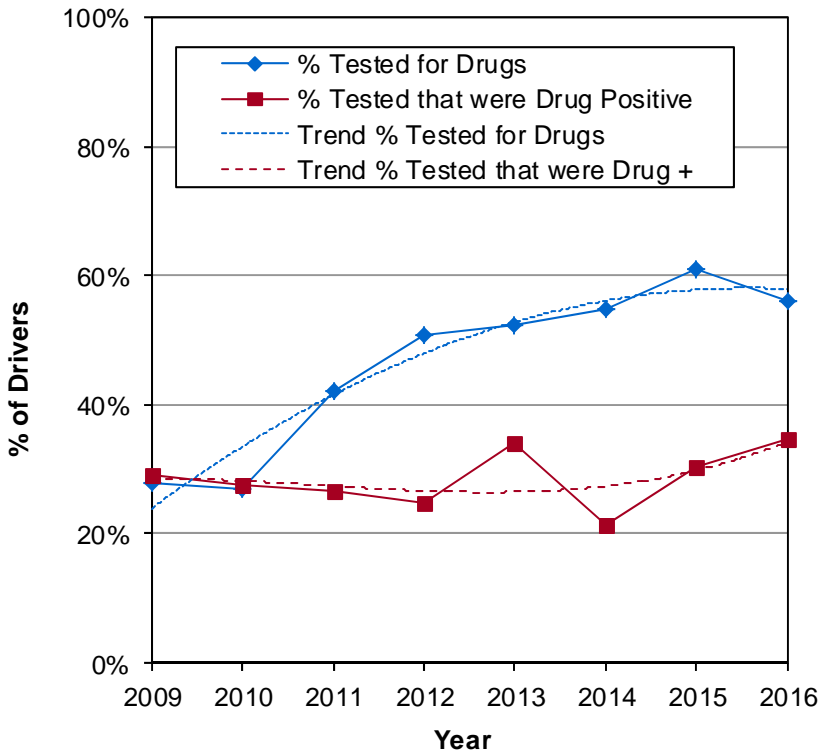
- Over the past 10 years, over one-fourth (27.6%) of fatal crashes involving a drug positive driver occurred in Salt Lake County.
- Salt Lake, Utah, and Weber counties had the highest number of fatal crashes involving drug positive drivers over the past 10 years.
- Piute and Rich Counties had no fatal crashes involving drug positive drivers over the past 10 years.

Note: Drug presence does not necessarily imply impairment. For many drug types, drug presence can be detected long after any impairment that might affect driving has passed. Also, whereas the impairment effects for various concentration levels of alcohol is well understood, little evidence is available to link concentrations of other drug types to driver performance.

Trends

Drivers in Fatal Crashes by Drug Test Results (Utah 2009-2016)

Drivers in Fatal Crashes										
Year	Not Tested for Drugs/Unknown		Negative for Drugs		Positive Alcohol (.08+ BAC) and Drug Test		Positive Drug Test Only		Total	Total Tested That were Drug Positive
	#	%	#	%	#	%	#	%		
2009	249	72.2%	68	19.7%	4	1.2%	24	7.0%	345	29.2%
2010	237	73.1%	63	19.4%	3	0.9%	21	6.5%	324	27.6%
2011	197	57.9%	105	30.9%	7	2.1%	31	9.1%	340	26.6%
2012	145	49.2%	113	38.3%	4	1.4%	33	11.2%	295	24.7%
2013	137	47.7%	99	34.5%	8	2.8%	43	15.0%	287	34.0%
2014	161	45.2%	153	43.0%	8	2.2%	34	9.6%	356	21.5%
2015	163	38.9%	178	42.5%	15	3.6%	63	15.0%	419	30.5%
2016	177	44.0%	147	36.6%	10	2.5%	68	16.9%	402	34.7%
Total	1,466	53.0%	926	33.5%	59	2.1%	317	11.5%	2,768	28.9%

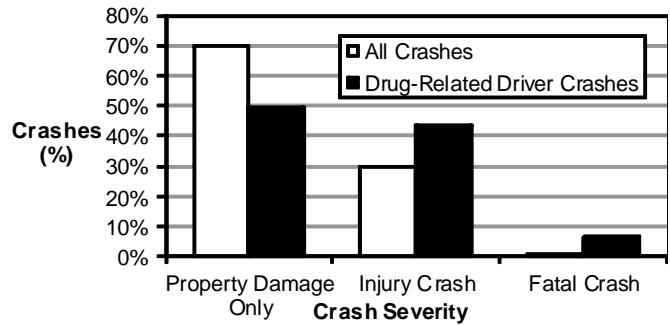


- Over the past eight years, the percent of drivers in fatal crashes who were tested for drugs and results of the test were known has steadily increased from 27.8% in 2009 to 56.0% in 2016.
- Some of the increase in positive drug tests may be due to an increase in the percentage of drivers tested for drugs with results known.
- Over the past eight years, 53.0% of drivers in fatal crashes were not tested for drugs or test results were unknown. Of those tested, 71.1% were negative for drugs, 24.3% tested positive for drugs only, and 4.5% tested positive for drugs and had a .08+ BAC test result.
- The percent of drivers that were tested that were drug positive has increased two years in a row with the 2016 total being the highest on record (34.7%).

Crash Conditions

Drug-Related Driver Crash Severity (Utah 2016)

- Drug-related driver crashes were 2.3 times more likely to have a death or injury than other crashes.
- A higher percentage of drug-related driver crashes (44%) resulted in an injury compared to all motor vehicle crashes that resulted in an injury (30%).
- In addition, a higher percentage of drug-related driver crashes were fatal (6.9%) compared to all motor vehicle crashes (0.4%).



Drug-Related Driver Crashes by County (Utah 2016)

Drug-Related Driver Crashes								
County	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT	#	Rate per 100 Million VMT
Weber	57	3.2	45	2.5	11	0.61	113	6.3
Salt Lake	239	2.4	222	2.3	16	0.16	477	4.8
Sevier	5	1.4	9	2.5	2	0.55	16	4.4
Tooele	17	1.9	16	1.8	5	0.55	38	4.2
Utah	86	1.8	71	1.5	10	0.21	167	3.5
Davis	62	2.1	31	1.0	9	0.30	102	3.4
Uintah	6	1.4	8	1.8	1	0.23	15	3.4
Morgan	2	1.3	3	2.0	0	0.00	5	3.4
Iron	10	1.2	13	1.6	3	0.36	26	3.1
Daggett	0	0.0	0	0.0	1	2.88	1	2.9
Washington	23	1.4	18	1.1	5	0.30	46	2.8
Duchesne	5	1.5	4	1.2	0	0.00	9	2.7
Garfield	1	0.8	1	0.8	1	0.77	3	2.3
Cache	7	0.7	11	1.1	3	0.30	21	2.1
Sanpete	0	0.0	3	1.2	2	0.81	5	2.0
Beaver	2	0.7	4	1.3	0	0.00	6	2.0
Wayne	0	0.0	1	1.8	0	0.00	1	1.8
Rich	0	0.0	1	1.8	0	0.00	1	1.8
Kane	1	0.6	2	1.2	0	0.00	3	1.8
Wasatch	5	1.2	2	0.5	0	0.00	7	1.7
Emery	2	0.5	3	0.8	1	0.26	6	1.5
Millard	2	0.4	4	0.7	2	0.35	8	1.4
Summit	8	0.9	1	0.1	3	0.35	12	1.4
Carbon	0	0.0	4	1.1	0	0.00	4	1.1
Juab	2	0.4	2	0.4	1	0.22	5	1.1
Box Elder	4	0.4	5	0.5	1	0.10	10	1.0
Grand	2	0.5	2	0.5	0	0.00	4	1.0
Piute	0	0.0	0	0.0	0	0.00	0	0.0
San Juan	0	0.0	0	0.0	0	0.00	0	0.0
Statewide	548	1.8	486	1.6	77	0.25	1,111	3.6

- Weber (6.3), Salt Lake (4.8), and Sevier (4.4) counties had the highest rates of drug-related driver total crashes per 100 million vehicle miles traveled.
- Piute and San Juan counties had no drug-related driver crashes.
- Over one-third (43%) of the crashes involving drug-related drivers occurred in Salt Lake County.



Crash Conditions

Drug-Related Driver Crashes by Day of Week (Utah 2016)

Drug-Related Driver Crashes								
Day of Week	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Sunday	76	13.9%	63	13.0%	13	16.9%	152	13.7%
Monday	65	11.9%	56	11.5%	10	13.0%	131	11.8%
Tuesday	64	11.7%	72	14.8%	8	10.4%	144	13.0%
Wednesday	73	13.3%	66	13.6%	12	15.6%	151	13.6%
Thursday	86	15.7%	73	15.0%	9	11.7%	168	15.1%
Friday	95	17.3%	85	17.5%	11	14.3%	191	17.2%
Saturday	89	16.2%	71	14.6%	14	18.2%	174	15.7%
Total	548	100.0%	486	100.0%	77	100.0%	1,111	100.0%

- The highest amount of drug-related driver total crashes occurred on Friday and Saturday.
- The highest amount of drug positive driver fatal crashes occurred on Saturday and Sunday.

Drug-Related Driver Crashes by Hour (Utah 2016)

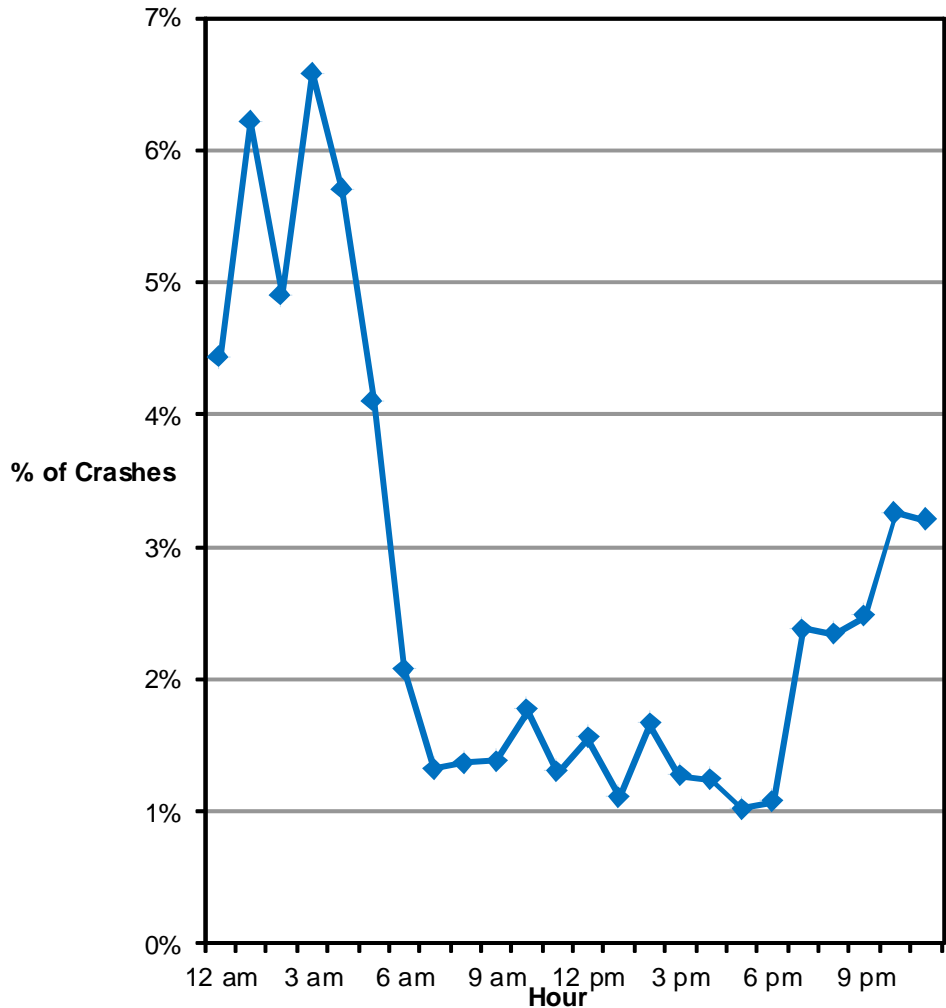
Drug-Related Driver Crashes								
Hour	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Midnight	28	5.1%	12	2.5%	4	5.2%	44	4.0%
1 a.m.	19	3.5%	20	4.1%	2	2.6%	41	3.7%
2 a.m.	9	1.6%	14	2.9%	2	2.6%	25	2.3%
3 a.m.	12	2.2%	14	2.9%	4	5.2%	30	2.7%
4 a.m.	13	2.4%	12	2.5%	2	2.6%	27	2.4%
5 a.m.	15	2.7%	15	3.1%	4	5.2%	34	3.1%
6 a.m.	21	3.8%	12	2.5%	1	1.3%	34	3.1%
7 a.m.	19	3.5%	19	3.9%	4	5.2%	42	3.8%
8 a.m.	25	4.6%	22	4.5%	2	2.6%	49	4.4%
9 a.m.	20	3.6%	15	3.1%	2	2.6%	37	3.3%
10 a.m.	18	3.3%	22	4.5%	2	2.6%	42	3.8%
11 a.m.	18	3.3%	18	3.7%	1	1.3%	37	3.3%
Noon	23	4.2%	23	4.7%	6	7.8%	52	4.7%
1 p.m.	23	4.2%	12	2.5%	4	5.2%	39	3.5%
2 p.m.	33	6.0%	26	5.3%	7	9.1%	66	5.9%
3 p.m.	31	5.7%	25	5.1%	5	6.5%	61	5.5%
4 p.m.	27	4.9%	33	6.8%	5	6.5%	65	5.9%
5 p.m.	30	5.5%	31	6.4%	4	5.2%	65	5.9%
6 p.m.	23	4.2%	27	5.6%	1	1.3%	51	4.6%
7 p.m.	31	5.7%	35	7.2%	7	9.1%	73	6.6%
8 p.m.	27	4.9%	23	4.7%	2	2.6%	52	4.7%
9 p.m.	28	5.1%	22	4.5%	3	3.9%	53	4.8%
10 p.m.	32	5.8%	21	4.3%	1	1.3%	54	4.9%
11 p.m.	23	4.2%	13	2.7%	2	2.6%	38	3.4%
Total	548	100.0%	486	100.0%	77	100.0%	1,111	100.0%

- Drug-related driver total crashes were highest during the hours of 2:00-7:59 p.m.

Crash Conditions

Percent of Total Crashes with a Drug-Related Driver by Hour (Utah 2016)

Drug-Related Driver Crashes			
Hour	Total Crashes		
	All #	Drug #	%
Midnight	993	44	4.4%
1 a.m.	660	41	6.2%
2 a.m.	510	25	4.9%
3 a.m.	456	30	6.6%
4 a.m.	474	27	5.7%
5 a.m.	829	34	4.1%
6 a.m.	1,639	34	2.1%
7 a.m.	3,169	42	1.3%
8 a.m.	3,576	49	1.4%
9 a.m.	2,671	37	1.4%
10 a.m.	2,379	42	1.8%
11 a.m.	2,843	37	1.3%
Noon	3,347	52	1.6%
1 p.m.	3,504	39	1.1%
2 p.m.	3,977	66	1.7%
3 p.m.	4,790	61	1.3%
4 p.m.	5,252	65	1.2%
5 p.m.	6,365	65	1.0%
6 p.m.	4,761	51	1.1%
7 p.m.	3,072	73	2.4%
8 p.m.	2,220	52	2.3%
9 p.m.	2,140	53	2.5%
10 p.m.	1,657	54	3.3%
11 p.m.	1,187	38	3.2%
Total	62,471	1,111	1.8%



- While 1.8% of total crashes were drug-related, 4.3% of the crashes occurring during the hours of 10:00 p.m.-5:59 a.m. were drug-related.

Persons in Drug-Related Driver Crashes (Utah 2016)

Persons Involved (Drug-Related Driver Crashes)								
Person Type	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Driver	1,119	74.4%	566	75.2%	62	75.6%	1,747	74.7%
Passenger	386	25.6%	175	23.2%	14	17.1%	575	24.6%
Pedestrian	0	0.0%	10	1.3%	5	6.1%	15	0.6%
Bicyclist	0	0.0%	2	0.3%	1	1.2%	3	0.1%
Total	1,505	100.0%	753	100.0%	82	100.0%	2,340	100.0%

- Of the 2,340 people in drug-related driver crashes, 75% were drivers, 25% were passengers, and 1% were non-motorists.

Crash Conditions

Drug-Related Driver Crashes by Month (Utah 2016)

Drug-Related Driver Crashes								
Month	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	39	1.3	33	1.1	2	0.06	74	2.4
February	36	1.2	47	1.6	0	0.00	83	2.9
March	46	1.5	43	1.4	4	0.13	93	3.0
April	52	1.7	35	1.2	7	0.23	94	3.1
May	42	1.4	38	1.2	10	0.32	90	2.9
June	42	1.4	53	1.8	14	0.47	109	3.6
July	50	1.6	44	1.4	8	0.26	102	3.3
August	47	1.5	52	1.7	5	0.16	104	3.4
September	48	1.6	45	1.5	8	0.27	101	3.4
October	48	1.5	35	1.1	10	0.32	93	3.0
November	55	1.8	31	1.0	6	0.20	92	3.1
December	43	1.4	30	1.0	3	0.10	76	2.5
Total	548	1.5	486	1.3	77	0.21	1,111	3.0

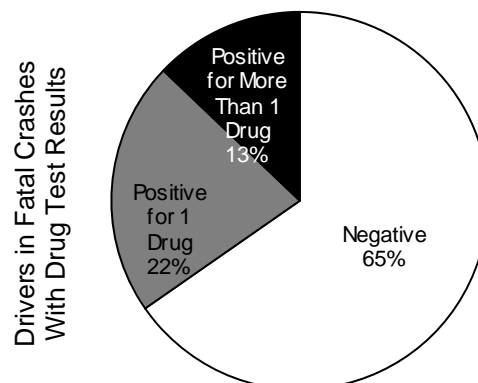
- Overall, the highest rates per day of drug-related driver crashes were in June (3.6), August (3.4), and September (3.4) with the lowest rates per day in January (2.4) and December (2.5).
- The highest rates per day of fatal drug positive driver crashes occurred in June, May, and October.

**DRUGGED DRIVING
IS IMPAIRED DRIVING.**

Drivers

Drivers in Fatal Crashes by Drug Test (Utah 2016)

Drug Test Results	Drivers		
	#	%	% of tested
Negative	147	36.6%	65.3%
Positive For 1 Drug	49	12.2%	21.8%
Positive For More Than 1 Drug	29	7.2%	12.9%
Not Tested/Unknown	177	44.0%	
Total	402	100.0%	100.0%

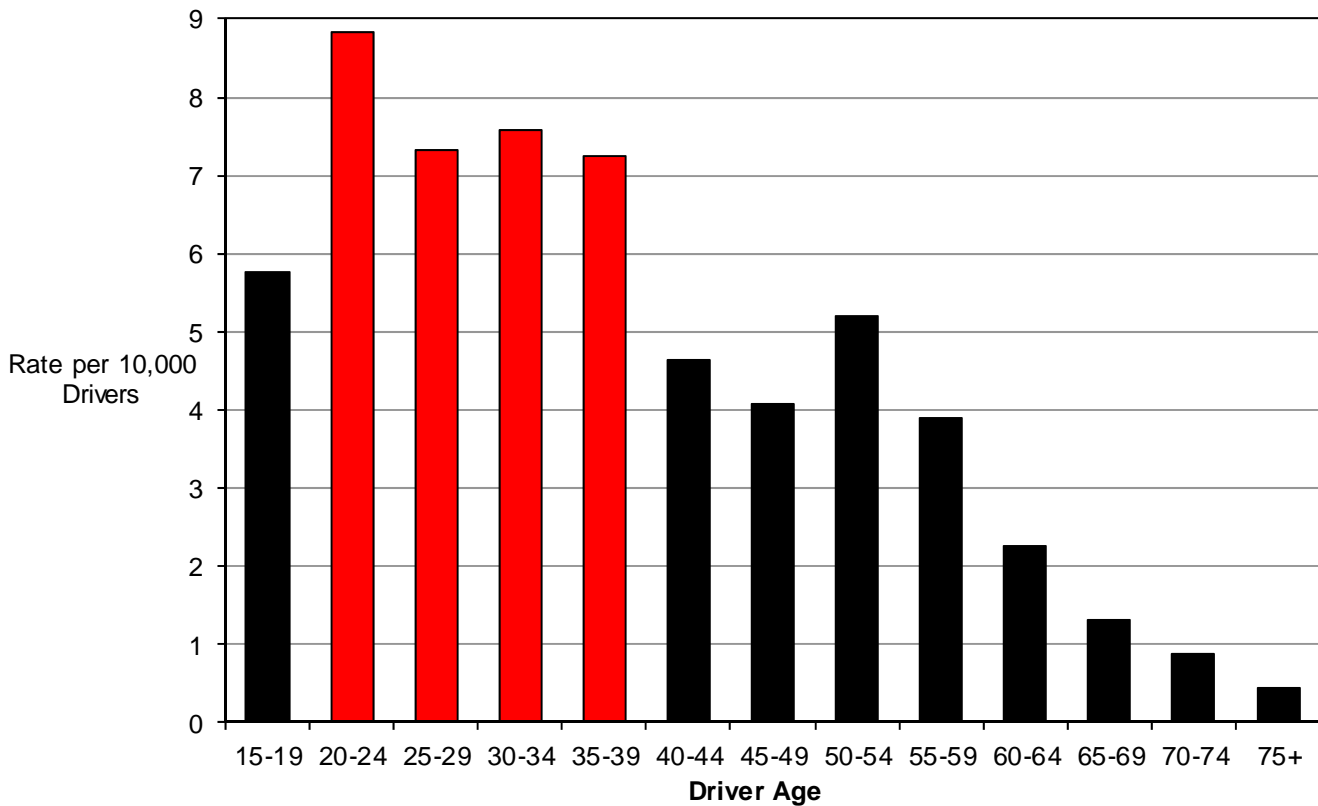


- Of the 225 drivers in fatal crashes who were tested for drugs, 147 (65%) tested negative, 49 (22%) tested positive for one drug, and 29 (13%) tested positive for more than one drug.

Drivers

Age of Drug-Related Drivers in Crashes (Utah 2016)

Drug-Related Drivers												
Age	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	#	%	Rate per 10,000 Drivers	#	%	Rate per 10,000 Drivers	#	%	Rate per 10,000 Drivers	#	%	Rate per 10,000 Drivers
<15	0	0.0%	n/a	0	0.0%	n/a	0	0.0%	n/a	0	0.0%	n/a
15-19	52	9.5%	2.8	49	10.1%	2.7	5	6.4%	0.27	106	9.5%	5.8
20-24	92	16.7%	4.3	86	17.7%	4.0	13	16.7%	0.60	191	17.1%	8.8
25-29	79	14.4%	3.7	71	14.6%	3.3	8	10.3%	0.37	158	14.2%	7.3
30-34	71	12.9%	3.5	77	15.8%	3.8	7	9.0%	0.34	155	13.9%	7.6
35-39	79	14.4%	3.7	65	13.3%	3.1	9	11.5%	0.43	153	13.7%	7.2
40-44	43	7.8%	2.4	34	7.0%	1.9	7	9.0%	0.39	84	7.5%	4.6
45-49	29	5.3%	1.9	29	6.0%	1.9	5	6.4%	0.32	63	5.7%	4.1
50-54	39	7.1%	2.8	28	5.7%	2.0	5	6.4%	0.36	72	6.5%	5.2
55-59	28	5.1%	1.9	23	4.7%	1.6	5	6.4%	0.35	56	5.0%	3.9
60-64	16	2.9%	1.2	11	2.3%	0.8	3	3.8%	0.23	30	2.7%	2.3
65-69	7	1.3%	0.6	4	0.8%	0.4	3	3.8%	0.28	14	1.3%	1.3
70-74	1	0.2%	0.1	3	0.6%	0.4	3	3.8%	0.38	7	0.6%	0.9
75+	0	0.0%	0.0	1	0.2%	0.1	4	5.1%	0.35	5	0.4%	0.4
Unknown	14	2.5%	n/a	6	1.2%	n/a	1	1.3%	n/a	21	1.9%	n/a
Total	550	100.0%	2.6	487	100.0%	2.3	78	100.0%	0.37	1,115	100.0%	5.4



- Drivers aged 20-39 years had the highest rate of total drug-related driver crashes.
- Drivers aged 20-24 and 35-39 years had the highest rates of drug positive driver fatal crashes.

Drivers

Gender of Drug-Related Drivers in Crashes (Utah 2016)

Drug-Related Drivers								
Gender	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Male	368	66.9%	322	66.1%	56	71.8%	746	66.9%
Female	170	30.9%	158	32.4%	22	28.2%	350	31.4%
Unknown	12	2.2%	7	1.4%	0	0.0%	19	1.7%
Total	550	100.0%	487	100.0%	78	100.0%	1,115	100.0%

- Male drivers were much more likely to be a drug-related driver in a crash. Male drivers represented 67% of the drug-related drivers in total crashes and 72% of the drug positive drivers in fatal crashes.

Drug Positive Drivers in Fatal Crashes by Test Results (Utah 2016)

Drug Positive Driver Test Results in Fatal Crashes		
Drug Type	Drivers	
	#	%
Depressant	31	25.8%
Narcotic	28	23.3%
Cannabinoid	26	21.7%
Stimulant	22	18.3%
Hallucinogen	2	1.7%
Other Drug	9	7.5%
Unknown Type	2	1.7%
Total	120	100.0%

Drug Positive Driver Test Results in Fatal Crashes			
Drug Type	Drug Category	Drivers	
		#	%
Marijuana/THC	Cannabinoid	26	21.7%
Methamphetamine	Stimulant	14	11.7%
Depressants, Type Unknown	Depressant	13	10.8%
Narcotics, Type Unknown	Narcotic	10	8.3%
Amphetamine	Stimulant	6	5.0%
Heroin	Narcotic	5	4.2%
Alprazolam	Depressant	4	3.3%
Hydrocodone	Narcotic	4	3.3%
Oxycodone	Narcotic	4	3.3%
Lorazepam	Depressant	3	2.5%
Butalbital	Depressant	2	1.7%
Clonazepam	Depressant	2	1.7%
Diazepam	Depressant	2	1.7%
Fentanyl	Narcotic	2	1.7%
Ketamine	Hallucinogen	2	1.7%
Zolpidem	Depressant	2	1.7%
Benzodiazepenes	Depressant	1	0.8%
Benzoylcegonine	Stimulant	1	0.8%
Cocaine	Stimulant	1	0.8%
Meperidine	Narcotic	1	0.8%
Meprobamate	Depressant	1	0.8%
Methadone	Narcotic	1	0.8%
Oxazepam	Depressant	1	0.8%
Oxymorphone	Narcotic	1	0.8%
Other Drug	Other	9	7.5%
Unknown Type	Unknown	2	1.7%
Total		120	100.0%

- These two tables show the same information. One table is by drug category and the other is by specific drugs.
- The totals are by test results and not by driver as a driver may be positive for more than one drug.
- Depressants (alprazolam, lorazepam), Narcotics (heroin, oxycodone), and Cannabinoids (marijuana/THC) were the most common drug types.
- Most of the drugs in the "other drug" category were positive test results for diphenhydramine.

Note: Drug presence does not necessarily imply impairment. For many drug types, drug presence can be detected long after any impairment that might affect driving has passed. Also, whereas the impairment effects for various concentration levels of alcohol is well understood, little evidence is available to link concentrations of other drug types to driver performance.

Distraction

D!STRACTION.GOV



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Section 6: Distraction



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Trends

Distracted Driver Crashes (Utah 2007-2016)

Year	Property Damage Only			Injury			Fatal			Total		
	All	Distracted Driver	%	All	Distracted Driver	%	All	Distracted Driver	%	All	Distracted Driver	%
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	3,778	8.9%	18,619	2,404	12.9%	258	23	8.9%	61,245	6,205	10.1%
2008	38,997	2,853	7.3%	17,125	1,940	11.3%	245	17	6.9%	56,367	4,810	8.5%
2009	35,398	2,753	7.8%	15,752	1,752	11.1%	217	21	9.7%	51,367	4,526	8.8%
2010	34,155	2,634	7.7%	14,995	1,704	11.4%	218	17	7.8%	49,368	4,355	8.8%
2011	36,418	2,998	8.2%	15,645	1,842	11.8%	224	20	8.9%	52,287	4,860	9.3%
2012	34,635	2,873	8.3%	15,765	1,914	12.1%	200	19	9.5%	50,600	4,806	9.5%
2013	39,301	3,052	7.8%	16,134	1,944	12.0%	202	17	8.4%	55,637	5,013	9.0%
2014	37,388	3,479	9.3%	16,426	2,202	13.4%	222	17	7.7%	54,036	5,698	10.5%
2015	42,089	3,665	8.7%	17,665	2,158	12.2%	258	27	10.5%	60,012	5,850	9.7%
2016	43,465	3,518	8.1%	18,747	2,205	11.8%	259	25	9.7%	62,471	5,748	9.2%
Total	384,214	31,603	8.2%	166,873	20,065	12.0%	2,303	203	8.8%	553,390	51,871	9.4%

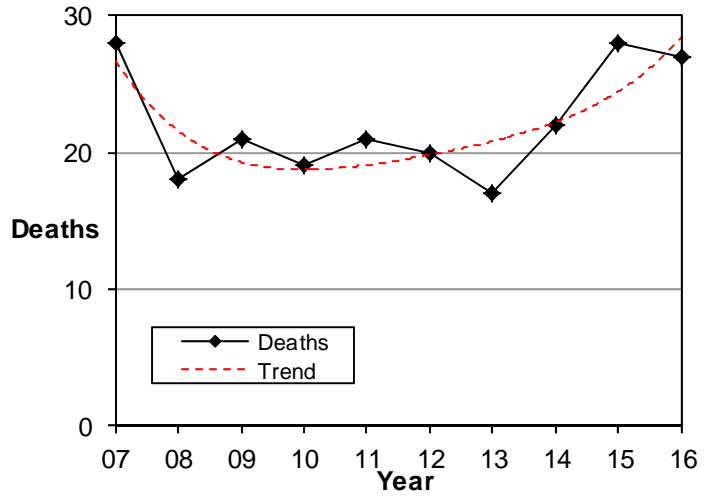


- The 10-year trend shows that 9.4% of all crashes in Utah involved a distracted driver.
- Fatal distracted driver crashes have fluctuated around the 10-year average of 8.8% of fatal crashes.
- While these numbers are significant, they may not state the true size of the problem, since the identification of distraction and its role in the crash by law enforcement can be very difficult.

Trends

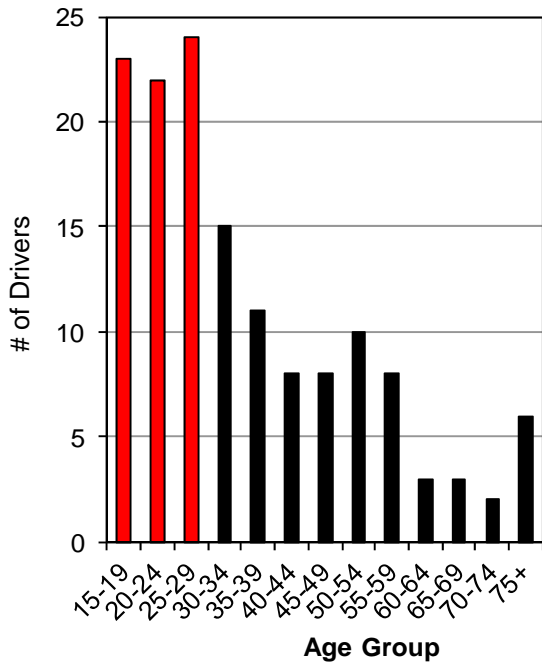
Fatal Crashes Involving Distracted Drivers (Utah 2007-2016)

Distracted Driver Crashes						
Year	Deaths			Fatal Crashes		
	All	Distracted	%	All	Distracted	%
	#	#	%	#	#	%
2007	299	28	9.4%	260	23	8.8%
2008	276	18	6.5%	244	17	7.0%
2009	244	21	8.6%	217	21	9.7%
2010	253	19	7.5%	218	17	7.8%
2011	243	21	8.6%	224	20	8.9%
2012	217	20	9.2%	200	19	9.5%
2013	220	17	7.7%	202	17	8.4%
2014	256	22	8.6%	222	17	7.7%
2015	278	28	10.1%	258	27	10.5%
2016	281	27	9.6%	259	25	9.7%
Total	2,567	221	8.6%	2,304	203	8.8%



- Over the past 10 years, the percentage of deaths and fatal crashes involving distracted drivers has fluctuated around 9% of all deaths and fatal crashes.
- On average, 22 people die a year in Utah from distracted driver crashes.

Distracted Drivers in Fatal Crashes by Age (Utah 2010-2016)



Distracted Drivers in Fatal Crashes									
Age	Year							Total	
	2010	2011	2012	2013	2014	2015	2016	#	%
<15	0	0	0	0	0	0	0	0	0.0%
15-19	6	3	3	2	2	2	5	23	16.1%
20-24	3	3	0	0	5	6	5	22	15.4%
25-29	2	5	5	1	3	4	4	24	16.8%
30-34	1	3	3	1	1	4	2	15	10.5%
35-39	0	1	3	3	1	0	3	11	7.7%
40-44	0	1	2	0	1	4	0	8	5.6%
45-49	1	0	1	1	1	3	1	8	5.6%
50-54	3	1	0	4	1	0	1	10	7.0%
55-59	0	2	1	3	1	0	1	8	5.6%
60-64	0	1	0	0	0	1	1	3	2.1%
65-69	0	0	0	1	0	1	1	3	2.1%
70-74	1	0	1	0	0	0	0	2	1.4%
75+	0	0	0	1	1	2	2	6	4.2%
Total	17	20	19	17	17	27	26	143	100.0%

- Over the past seven years, drivers aged 15-29 years had the highest number of distracted drivers in fatal crashes.

Crash Conditions

Distracted Driver Crashes by County (Utah 2016)

Distracted Driver Crashes												
County	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	All	Distraction		All	Distraction		All	Distraction		All	Distraction	
	#	#	%	#	#	%	#	#	%	#	#	%
Cache	1,557	178	11.4%	496	73	14.7%	11	0	0.0%	2,064	251	12.2%
Utah	6,376	603	9.5%	2,960	411	13.9%	29	3	10.3%	9,365	1,017	10.9%
Weber	2,836	271	9.6%	1,560	185	11.9%	17	3	17.6%	4,413	459	10.4%
Grand	153	17	11.1%	65	6	9.2%	4	0	0.0%	222	23	10.4%
Tooele	749	72	9.6%	340	41	12.1%	18	1	5.6%	1,107	114	10.3%
Duchesne	234	17	7.3%	67	14	20.9%	1	0	0.0%	302	31	10.3%
Davis	3,972	358	9.0%	1,780	198	11.1%	24	5	20.8%	5,776	561	9.7%
Wayne	40	3	7.5%	24	3	12.5%	0	0	n/a	64	6	9.4%
Salt Lake	19,674	1,552	7.9%	8,546	975	11.4%	67	8	11.9%	28,287	2,535	9.0%
Iron	698	53	7.6%	249	32	12.9%	4	0	0.0%	951	85	8.9%
Washington	1,845	141	7.6%	847	98	11.6%	14	0	0.0%	2,706	239	8.8%
Sevier	274	15	5.5%	110	15	13.6%	6	1	16.7%	390	31	7.9%
Beaver	175	6	3.4%	76	13	17.1%	0	0	n/a	251	19	7.6%
Sanpete	265	18	6.8%	95	9	9.5%	4	0	0.0%	364	27	7.4%
Daggett	13	0	0.0%	0	0	n/a	1	1	100.0%	14	1	7.1%
Box Elder	972	53	5.5%	378	38	10.1%	9	2	22.2%	1,359	93	6.8%
Emery	170	9	5.3%	79	6	7.6%	7	1	14.3%	256	16	6.3%
Rich	58	3	5.2%	23	2	8.7%	0	0	n/a	81	5	6.2%
Summit	898	44	4.9%	291	28	9.6%	4	0	0.0%	1,193	72	6.0%
Uintah	397	23	5.8%	100	7	7.0%	2	0	0.0%	499	30	6.0%
Millard	301	12	4.0%	128	13	10.2%	5	0	0.0%	434	25	5.8%
Carbon	292	14	4.8%	90	8	8.9%	3	0	0.0%	385	22	5.7%
Wasatch	554	29	5.2%	165	8	4.8%	7	0	0.0%	726	37	5.1%
Morgan	131	5	3.8%	34	3	8.8%	1	0	0.0%	166	8	4.8%
Garfield	165	4	2.4%	60	7	11.7%	5	0	0.0%	230	11	4.8%
Juab	262	7	2.7%	86	6	7.0%	5	0	0.0%	353	13	3.7%
San Juan	220	6	2.7%	38	3	7.9%	8	0	0.0%	266	9	3.4%
Kane	156	4	2.6%	50	3	6.0%	2	0	0.0%	208	7	3.4%
Piute	28	1	3.6%	10	0	0.0%	1	0	0.0%	39	1	2.6%
Statewide	43,465	3,518	8.1%	18,747	2,205	11.8%	259	25	9.7%	62,471	5,748	9.2%

- Overall, Cache (12.2%), Utah (10.9%), and Weber (10.4%) counties had the highest percentages of crashes involving a distracted driver.
- Overall, Piute (2.6%), Kane (3.4%), and San Juan (3.4%) counties had the lowest percentages of crashes involving a distracted driver.
- Salt Lake County had the most distracted driver crashes accounting for 44.1% of the distracted driver crashes in the state.
- Statewide, distracted driver crashes represented 9.2% of all crashes and 9.7% of all fatal crashes.

Crash Conditions

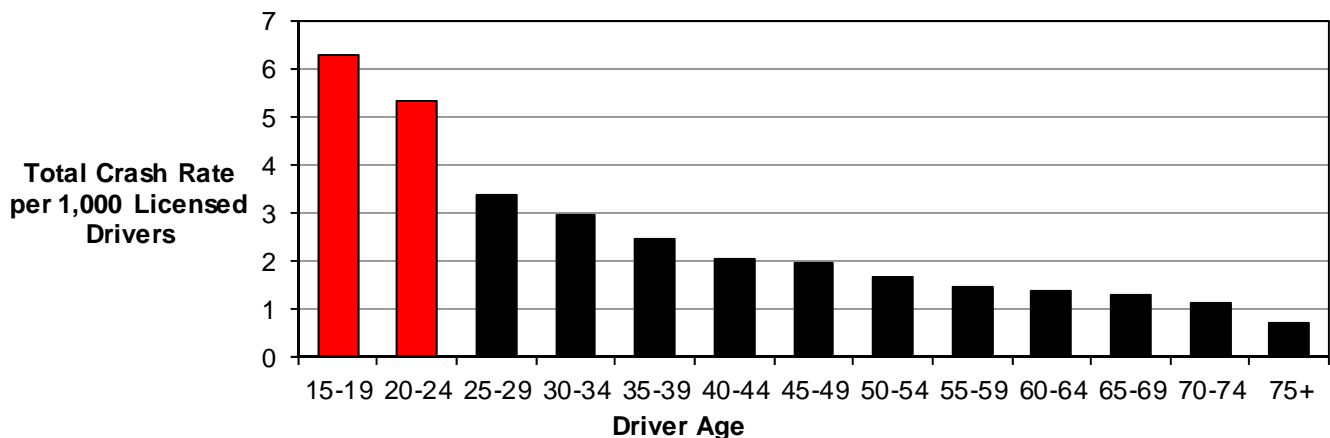
Gender of Distracted Drivers in Crashes (Utah 2016)

Distracted Drivers								
Gender	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Male	2,025	56.8%	1,196	53.8%	15	57.7%	3,236	55.6%
Female	1,520	42.6%	1,021	45.9%	11	42.3%	2,552	43.9%
Unknown	21	0.6%	8	0.4%	0	0.0%	29	0.5%
Total	3,566	100.0%	2,225	100.0%	26	100.0%	5,817	100.0%

- The majority of distracted drivers in all motor vehicle crashes (55.6%) and fatal crashes (57.7%) were male.

Age of Distracted Drivers in Crashes (Utah 2016)

Distracted Drivers												
Age	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers
<15	2	0.1%	n/a	5	0.2%	n/a	0	0.0%	n/a	7	0.1%	n/a
15-19	727	20.4%	3.96	423	19.0%	2.30	5	19.2%	0.027	1,155	19.9%	6.29
20-24	730	20.5%	3.38	420	18.9%	1.94	5	19.2%	0.023	1,155	19.9%	5.35
25-29	435	12.2%	2.01	291	13.1%	1.35	4	15.4%	0.019	730	12.5%	3.38
30-34	347	9.7%	1.69	254	11.4%	1.24	2	7.7%	0.010	603	10.4%	2.94
35-39	297	8.3%	1.41	214	9.6%	1.01	3	11.5%	0.014	514	8.8%	2.43
40-44	230	6.4%	1.27	138	6.2%	0.76	0	0.0%	0.000	368	6.3%	2.03
45-49	183	5.1%	1.18	116	5.2%	0.75	1	3.8%	0.006	300	5.2%	1.94
50-54	155	4.3%	1.12	74	3.3%	0.53	1	3.8%	0.007	230	4.0%	1.66
55-59	113	3.2%	0.78	96	4.3%	0.67	1	3.8%	0.007	210	3.6%	1.46
60-64	122	3.4%	0.92	57	2.6%	0.43	1	3.8%	0.008	180	3.1%	1.36
65-69	81	2.3%	0.75	54	2.4%	0.50	1	3.8%	0.009	136	2.3%	1.26
70-74	54	1.5%	0.68	35	1.6%	0.44	0	0.0%	0.000	89	1.5%	1.11
75+	46	1.3%	0.41	28	1.3%	0.25	2	7.7%	0.018	76	1.3%	0.67
Unknown	44	1.2%	n/a	20	0.9%	n/a	0	0.0%	n/a	64	1.1%	n/a
Total	3,566	100.0%	1.71	2,225	100.0%	1.07	26	100.0%	0.012	5,817	100.0%	2.79

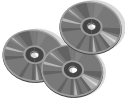


- The younger the driver the more likely they were to be distracted in a crash.

Crash Conditions

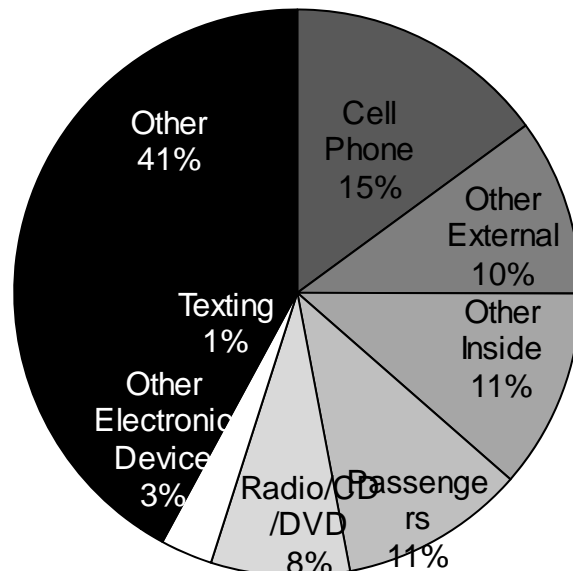
Driver Distraction (Utah 2016)

Driver Distraction	Crashes							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
None	32,006	73.6%	12,739	68.0%	108	41.7%	44,853	71.8%
Cell Phone	493	1.1%	364	1.9%	2	0.8%	859	1.4%
Other Inside	380	0.9%	268	1.4%	7	2.7%	655	1.0%
Passengers	354	0.8%	251	1.3%	3	1.2%	608	1.0%
Other External	368	0.8%	209	1.1%	3	1.2%	580	0.9%
Radio/CD/DVD etc.	278	0.6%	177	0.9%	0	0.0%	455	0.7%
Other Electronic Device	122	0.3%	49	0.3%	0	0.0%	171	0.3%
Texting	46	0.1%	35	0.2%	0	0.0%	81	0.1%
TV/Monitor	1	0.0%	0	0.0%	0	0.0%	1	0.0%
Other	1,476	3.4%	852	4.5%	10	3.9%	2,338	3.7%
Unknown	7,941	18.3%	3,803	20.3%	126	48.6%	11,870	19.0%
Total	43,465	100.0%	18,747	100.0%	259	100.0%	62,471	100.0%



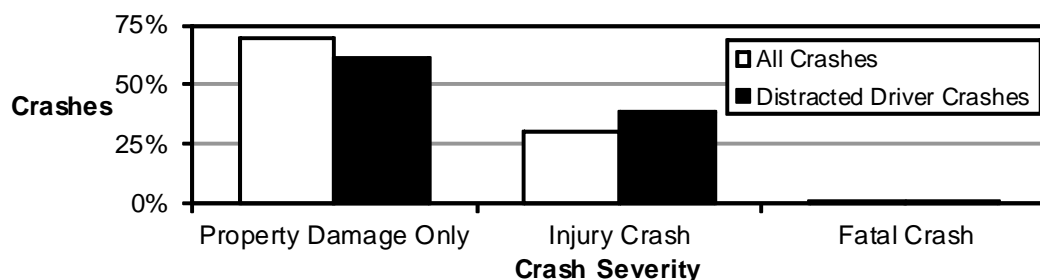
Driver Distraction	Distracted Driver Crashes							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Other	1,476	42.0%	852	38.6%	10	40.0%	2,338	40.7%
Cell Phone	493	14.0%	364	16.5%	2	8.0%	859	14.9%
Other Inside	380	10.8%	268	12.2%	7	28.0%	655	11.4%
Passengers	354	10.1%	251	11.4%	3	12.0%	608	10.6%
Other External	368	10.5%	209	9.5%	3	12.0%	580	10.1%
Radio/CD/DVD etc.	278	7.9%	177	8.0%	0	0.0%	455	7.9%
Other Electronic Device	122	3.5%	49	2.2%	0	0.0%	171	3.0%
Texting	46	1.3%	35	1.6%	0	0.0%	81	1.4%
TV/Monitor	1	0.0%	0	0.0%	0	0.0%	1	0.0%
Total	3,518	100.0%	2,205	100.0%	25	100.0%	5,748	100.0%

- The bottom chart only contains distracted driver crashes, i.e. it is the same as the top except none and unknown are removed.
- For all crashes where driver distraction was known, 11.4% of crashes involved a distracted driver.
- Cell phone was the leading driver distraction (14.9% of distractions).
- Over one-third (40.7%) of distractions listed were "other."
- Driving demands the full attention of the driver.



Crash Conditions

Distracted Driver Crash Severity (Utah 2016)



- Distracted driver crashes were more likely to result in injury compared to all motor vehicle crashes (38.4% to 30.0%).

Distracted Driver Crashes by Month (Utah 2016)

Distracted Driver Crashes								
Month	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	251	8.1	151	4.9	2	0.06	404	13.0
February	252	8.7	157	5.4	4	0.14	413	14.2
March	282	9.1	164	5.3	3	0.10	449	14.5
April	285	9.5	195	6.5	3	0.10	483	16.1
May	308	9.9	194	6.3	1	0.03	503	16.2
June	320	10.7	193	6.4	6	0.20	519	17.3
July	265	8.5	186	6.0	1	0.03	452	14.6
August	315	10.2	211	6.8	0	0.00	526	17.0
September	377	12.6	196	6.5	1	0.03	574	19.1
October	293	9.5	213	6.9	2	0.06	508	16.4
November	298	9.9	169	5.6	1	0.03	468	15.6
December	272	8.8	176	5.7	1	0.03	449	14.5
Total	3,518	9.6	2,205	6.0	25	0.07	5,748	15.7

- Overall, September (19.1) and June (17.3) had the highest rates per day for distracted driver crashes.
- The highest rate per day of fatal distracted driver crashes occurred in June (0.20).

Distracted Driver Crashes by Day of Week (Utah 2016)

Distracted Driver Crashes								
Day of Week	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Sunday	263	7.5%	171	7.8%	5	20.0%	439	7.6%
Monday	561	15.9%	395	17.9%	5	20.0%	961	16.7%
Tuesday	595	16.9%	339	15.4%	2	8.0%	936	16.3%
Wednesday	562	16.0%	339	15.4%	3	12.0%	904	15.7%
Thursday	535	15.2%	333	15.1%	4	16.0%	872	15.2%
Friday	565	16.1%	358	16.2%	3	12.0%	926	16.1%
Saturday	437	12.4%	270	12.2%	3	12.0%	710	12.4%
Total	3,518	100.0%	2,205	100.0%	25	100.0%	5,748	100.0%

- Overall, the highest percentage of distracted driver crashes occurred on Monday (16.7%).
- The highest percentage of fatal distracted driver crashes occurred on Sunday and Monday (20.0%).

Crash Conditions

Distracted Driver Crashes by Hour (Utah 2016)

Distracted Driver Crashes								
Hour	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Midnight	45	1.3%	27	1.2%	1	4.0%	73	1.3%
1 a.m.	28	0.8%	28	1.3%	0	0.0%	56	1.0%
2 a.m.	18	0.5%	11	0.5%	0	0.0%	29	0.5%
3 a.m.	19	0.5%	13	0.6%	2	8.0%	34	0.6%
4 a.m.	18	0.5%	11	0.5%	0	0.0%	29	0.5%
5 a.m.	32	0.9%	15	0.7%	2	8.0%	49	0.9%
6 a.m.	41	1.2%	41	1.9%	1	4.0%	83	1.4%
7 a.m.	143	4.1%	80	3.6%	1	4.0%	224	3.9%
8 a.m.	206	5.9%	141	6.4%	0	0.0%	347	6.0%
9 a.m.	184	5.2%	104	4.7%	0	0.0%	288	5.0%
10 a.m.	141	4.0%	81	3.7%	1	4.0%	223	3.9%
11 a.m.	173	4.9%	115	5.2%	1	4.0%	289	5.0%
Noon	210	6.0%	138	6.3%	2	8.0%	350	6.1%
1 p.m.	194	5.5%	142	6.4%	2	8.0%	338	5.9%
2 p.m.	237	6.7%	150	6.8%	3	12.0%	390	6.8%
3 p.m.	294	8.4%	171	7.8%	1	4.0%	466	8.1%
4 p.m.	359	10.2%	215	9.8%	2	8.0%	576	10.0%
5 p.m.	412	11.7%	235	10.7%	1	4.0%	648	11.3%
6 p.m.	294	8.4%	171	7.8%	1	4.0%	466	8.1%
7 p.m.	153	4.3%	100	4.5%	1	4.0%	254	4.4%
8 p.m.	106	3.0%	67	3.0%	0	0.0%	173	3.0%
9 p.m.	87	2.5%	61	2.8%	1	4.0%	149	2.6%
10 p.m.	76	2.2%	54	2.4%	2	8.0%	132	2.3%
11 p.m.	48	1.4%	34	1.5%	0	0.0%	82	1.4%
Total	3,518	100.0%	2,205	100.0%	25	100.0%	5,748	100.0%

- Distracted driver total crashes were highest from 3:00 p.m. to 6:59 p.m.

Distracted Driver Crashes by Manner of Collision (Utah 2016)

Distracted Driver Crashes								
Collision Description	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Rear End (front-to-rear)	1,915	54.4%	1,204	54.6%	4	16.0%	3,123	54.3%
Single Vehicle	597	17.0%	450	20.4%	14	56.0%	1,061	18.5%
Angle	446	12.7%	322	14.6%	4	16.0%	772	13.4%
Parked Vehicle	232	6.6%	86	3.9%	0	0.0%	318	5.5%
Sideswipe	245	7.0%	62	2.8%	3	12.0%	310	5.4%
Head On (front-to-front)	45	1.3%	60	2.7%	0	0.0%	105	1.8%
Rear to Side/Rear	11	0.3%	0	0.0%	0	0.0%	11	0.2%
Other	15	0.4%	13	0.6%	0	0.0%	28	0.5%
Unknown	12	0.3%	8	0.4%	0	0.0%	20	0.3%
Total	3,518	100.0%	2,205	100.0%	25	100.0%	5,748	100.0%

- Over half of distracted driver crashes were rear end collisions. In comparison, 32% of all crashes were rear end collisions. Distracted driver crashes were 2.8 times more likely to be rear end collisions than other crashes.

Crash Conditions

Distracted Drivers by Vehicle Maneuver (Utah 2016)

Distracted Driver Vehicles								
Vehicle Maneuver	PDO Crashes		Injury Crashes		Fatal Crashes		Total Crashes	
	#	%	#	%	#	%	#	%
Straight Ahead	2,693	75.5%	1,826	82.1%	24	92.3%	4,543	78.1%
Slowing in Traffic Lane	193	5.4%	109	4.9%	1	3.8%	303	5.2%
Turning Left	185	5.2%	103	4.6%	0	0.0%	288	5.0%
Turning Right	108	3.0%	41	1.8%	0	0.0%	149	2.6%
Changing Lanes	84	2.4%	30	1.3%	1	3.8%	115	2.0%
Backing	86	2.4%	10	0.4%	0	0.0%	96	1.7%
Leaving Traffic Lane	52	1.5%	26	1.2%	0	0.0%	78	1.3%
Stopped in Traffic Lane	47	1.3%	26	1.2%	0	0.0%	73	1.3%
Entering Traffic Lane	21	0.6%	11	0.5%	0	0.0%	32	0.6%
Making U-turn	14	0.4%	9	0.4%	0	0.0%	23	0.4%
Parking Maneuvers	17	0.5%	2	0.1%	0	0.0%	19	0.3%
Overtaking/Passing	7	0.2%	3	0.1%	0	0.0%	10	0.2%
Parked	1	0.0%	2	0.1%	0	0.0%	3	0.1%
Other	50	1.4%	24	1.1%	0	0.0%	74	1.3%
Unknown	8	0.2%	3	0.1%	0	0.0%	11	0.2%
Total	3,566	100.0%	2,225	100.0%	26	100.0%	5,817	100.0%

- The leading vehicle maneuvers for distracted drivers in crashes were straight ahead, slowing in traffic lane, and turning left.

Distracted Driver Vehicles by Speed Limit (Utah 2016)

Distracted Driver Vehicles								
Speed Limit	PDO Crashes		Injury Crashes		Fatal Crashes		Total Crashes	
	#	%	#	%	#	%	#	%
5-15 MPH	55	1.5%	16	0.7%	0	0.0%	71	1.2%
20-25 MPH	533	14.9%	222	10.0%	4	15.4%	759	13.0%
30-35 MPH	812	22.8%	533	24.0%	4	15.4%	1,349	23.2%
40-45 MPH	788	22.1%	557	25.0%	5	19.2%	1,350	23.2%
50-55 MPH	199	5.6%	183	8.2%	2	7.7%	384	6.6%
60-65 MPH	147	4.1%	102	4.6%	4	15.4%	253	4.3%
70-75 MPH	473	13.3%	235	10.6%	1	3.8%	709	12.2%
80 MPH	37	1.0%	32	1.4%	4	15.4%	73	1.3%
Unknown	522	14.6%	345	15.5%	2	7.7%	869	14.9%
Total	3,566	100.0%	2,225	100.0%	26	100.0%	5,817	100.0%

- Over half (55% of known) of distracted driver crashes occurred where the speed limit was 30-45 MPH.

Crash Conditions

Distracted Driver Crashes by Roadway Junction/Feature (Utah 2016)

Distracted Driver Crashes								
Roadway Junction or Feature	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
None	2,049	58.2%	1,233	55.9%	15	60.0%	3,297	57.4%
4-Leg Intersection	776	22.1%	584	26.5%	4	16.0%	1,364	23.7%
T-Intersection	277	7.9%	159	7.2%	2	8.0%	438	7.6%
On-Ramp/Off-Ramp	112	3.2%	56	2.5%	4	16.0%	172	3.0%
Business/Residential Drive	96	2.7%	53	2.4%	0	0.0%	149	2.6%
Bridge (overpass/underpass)	39	1.1%	28	1.3%	0	0.0%	67	1.2%
On-Ramp Merge/Off-Ramp Diverge Area	37	1.1%	23	1.0%	0	0.0%	60	1.0%
Other Intersection (Y, 5-Leg, Ramp w/X-rd)	40	1.1%	19	0.9%	0	0.0%	59	1.0%
Railroad Crossing	16	0.5%	8	0.4%	0	0.0%	24	0.4%
Roundabout	10	0.3%	7	0.3%	0	0.0%	17	0.3%
Other	63	1.8%	32	1.5%	0	0.0%	95	1.7%
Unknown	3	0.1%	3	0.1%	0	0.0%	6	0.1%
Total	3,518	100.0%	2,205	100.0%	25	100.0%	5,748	100.0%

- Over half (57%) of distracted driver crashes occurred where there was no roadway junction or feature. Nearly one-fourth (24%) of distracted driver crashes occurred at a 4-leg intersection and 8% occurred at a T-intersection.

Distracted Driver Vehicles by Traffic Control Device (Utah 2016)

Distracted Driver Vehicles								
Traffic Control Device	PDO Crashes		Injury Crashes		Fatal Crashes		Total Crashes	
	#	%	#	%	#	%	#	%
None	2,296	64.4%	1,342	60.3%	19	73.1%	3,657	62.9%
Traffic Control Signal	992	27.8%	714	32.1%	5	19.2%	1,711	29.4%
Stop Sign	173	4.9%	93	4.2%	0	0.0%	266	4.6%
Yield Sign	26	0.7%	16	0.7%	2	7.7%	44	0.8%
Flashing Traffic Control Signal	13	0.4%	15	0.7%	0	0.0%	28	0.5%
Flagger or Officer	15	0.4%	7	0.3%	0	0.0%	22	0.4%
Railroad Crossing	13	0.4%	9	0.4%	0	0.0%	22	0.4%
School Zone	5	0.1%	10	0.4%	0	0.0%	15	0.3%
Warning Sign	10	0.3%	5	0.2%	0	0.0%	15	0.3%
Ramp Metering - Active	3	0.1%	0	0.0%	0	0.0%	3	0.1%
Other	19	0.5%	14	0.6%	0	0.0%	33	0.6%
Unknown	1	0.0%	0	0.0%	0	0.0%	1	0.0%
Total	3,566	100.0%	2,225	100.0%	26	100.0%	5,817	100.0%

- 63% of distracted driver total crashes occurred where there was no traffic control device and 29% occurred where the vehicle movement was controlled by a traffic control signal.

Drowsy Drivers

**SLEEP SMART.
DRIVE SMART.**

DROWSY DRIVING KILLS



2



Section 7: Drowsy Drivers

Trends

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Trends

Drowsy Driver Crashes (Utah 2007-2016)

Year	Property Damage Only			Injury			Fatal			Total		
	All	Drowsy Driver		All	Drowsy Driver		All	Drowsy Driver		All	Drowsy Driver	
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	694	1.6%	18,619	584	3.1%	258	35	13.6%	61,245	1,313	2.1%
2008	38,997	594	1.5%	17,125	510	3.0%	245	18	7.3%	56,367	1,122	2.0%
2009	35,398	616	1.7%	15,752	448	2.8%	217	19	8.8%	51,367	1,083	2.1%
2010	34,155	524	1.5%	14,995	429	2.9%	218	8	3.7%	49,368	961	1.9%
2011	36,418	546	1.5%	15,645	404	2.6%	224	5	2.2%	52,287	955	1.8%
2012	34,635	597	1.7%	15,765	414	2.6%	200	13	6.5%	50,600	1,024	2.0%
2013	39,301	587	1.5%	16,134	417	2.6%	202	11	5.4%	55,637	1,015	1.8%
2014	37,388	583	1.6%	16,426	452	2.8%	222	6	2.7%	54,036	1,041	1.9%
2015	42,089	661	1.6%	17,665	503	2.8%	258	14	5.4%	60,012	1,178	2.0%
2016	43,465	746	1.7%	18,747	511	2.7%	259	14	5.4%	62,471	1,271	2.0%
Total	384,214	6,148	1.6%	166,873	4,672	2.8%	2,303	143	6.2%	553,390	10,963	2.0%

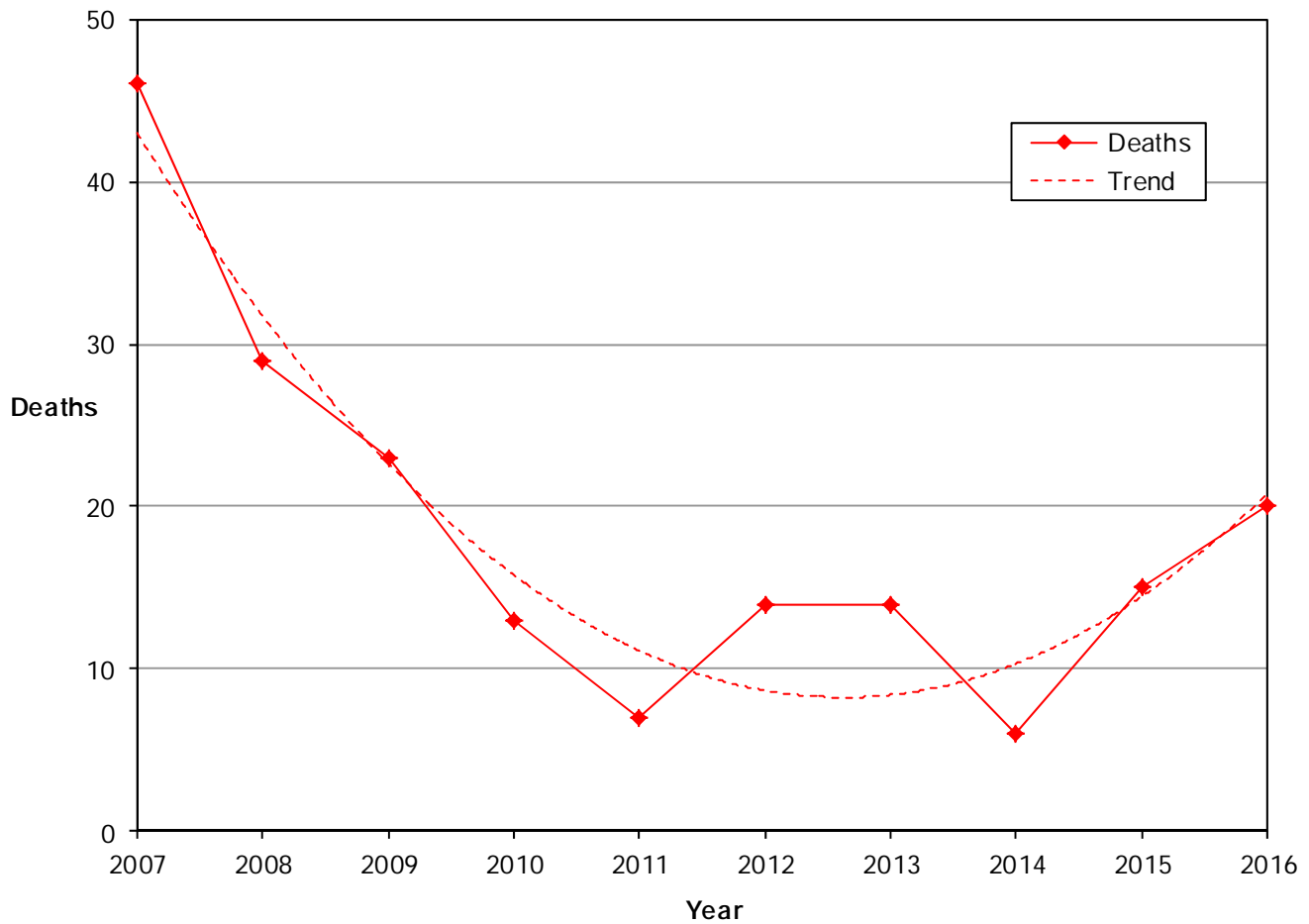


- The 10-year trend shows that 2.0% of all crashes in Utah involved a drowsy driver.
- Fatal drowsy driver crashes have accounted for 6.2% of fatal crashes over the last 10 years.
- While these numbers are significant, they may not state the true size of the problem, since the identification of drowsiness or fatigue and its role in the crash by law enforcement can be very difficult.

Trends

Fatal Crashes Involving Drowsy Drivers (Utah 2007-2016)

Year	Drowsy Driver Crashes					
	Deaths			Fatal Crashes		
	All #	Drowsy #	%	All #	Drowsy #	%
2007	299	46	15.4%	260	35	13.5%
2008	276	29	10.5%	244	18	7.4%
2009	244	23	9.4%	217	19	8.8%
2010	253	13	5.1%	218	8	3.7%
2011	243	7	2.9%	224	5	2.2%
2012	217	14	6.5%	200	13	6.5%
2013	220	14	6.4%	202	11	5.4%
2014	256	6	2.3%	222	6	2.7%
2015	278	15	5.4%	258	14	5.4%
2016	281	20	7.1%	259	14	5.4%
Total	2,567	187	7.3%	2,304	143	6.2%

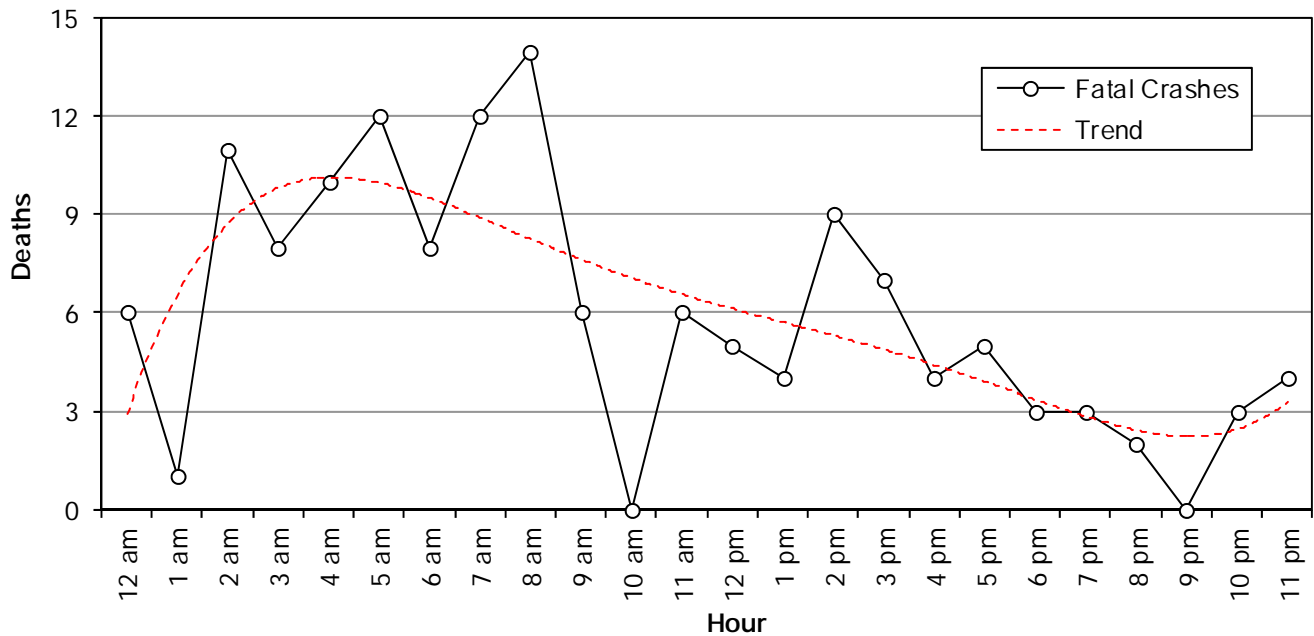


- Over the past 10 years, the percentage of deaths and fatal crashes involving drowsy drivers has fluctuated around 7% of all deaths and 6% of fatal crashes.
- On average, 19 people die a year in Utah from drowsy driver crashes.

Trends

Fatal Crashes Involving Drowsy Drivers by Hour (Utah 2007-2016)

Fatal Drowsy Driver Crashes												
Hour	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	Total	%
Midnight	1	1	2	0	0	0	1	1	0	0	6	4.2%
1 a.m.	0	0	0	0	0	0	0	0	0	1	1	0.7%
2 a.m.	2	2	3	0	1	0	0	1	1	1	11	7.7%
3 a.m.	5	0	1	0	0	0	0	0	0	2	8	5.6%
4 a.m.	2	0	4	0	1	0	1	0	2	0	10	7.0%
5 a.m.	3	2	1	1	0	1	1	0	1	2	12	8.4%
6 a.m.	2	2	0	0	0	2	0	1	1	0	8	5.6%
7 a.m.	3	3	2	1	0	0	2	0	1	0	12	8.4%
8 a.m.	5	0	0	2	0	1	2	1	1	2	14	9.8%
9 a.m.	0	0	1	0	1	2	0	0	1	1	6	4.2%
10 a.m.	0	0	0	0	0	0	0	0	0	0	0	0.0%
11 a.m.	1	2	0	0	0	2	1	0	0	0	6	4.2%
Noon	2	0	0	0	1	1	0	0	0	1	5	3.5%
1 p.m.	0	2	1	0	0	0	0	0	0	1	4	2.8%
2 p.m.	2	0	0	0	0	2	1	1	3	0	9	6.3%
3 p.m.	1	0	1	1	1	0	1	0	2	0	7	4.9%
4 p.m.	1	1	0	0	0	2	0	0	0	0	4	2.8%
5 p.m.	1	0	1	1	0	0	0	1	0	1	5	3.5%
6 p.m.	0	1	0	1	0	0	1	0	0	0	3	2.1%
7 p.m.	0	1	1	0	0	0	0	0	0	1	3	2.1%
8 p.m.	0	0	0	0	0	0	0	0	1	1	2	1.4%
9 p.m.	0	0	0	0	0	0	0	0	0	0	0	0.0%
10 p.m.	2	1	0	0	0	0	0	0	0	0	3	2.1%
11 p.m.	2	0	1	1	0	0	0	0	0	0	4	2.8%
Total	35	18	19	8	5	13	11	6	14	14	143	100.0%



- Over the past 10 years, fatal drowsy driver crashes were highest during the hours of 2:00-8:59 a.m.

Crash Conditions

Drowsy Driver Crashes by County (Utah 2016)

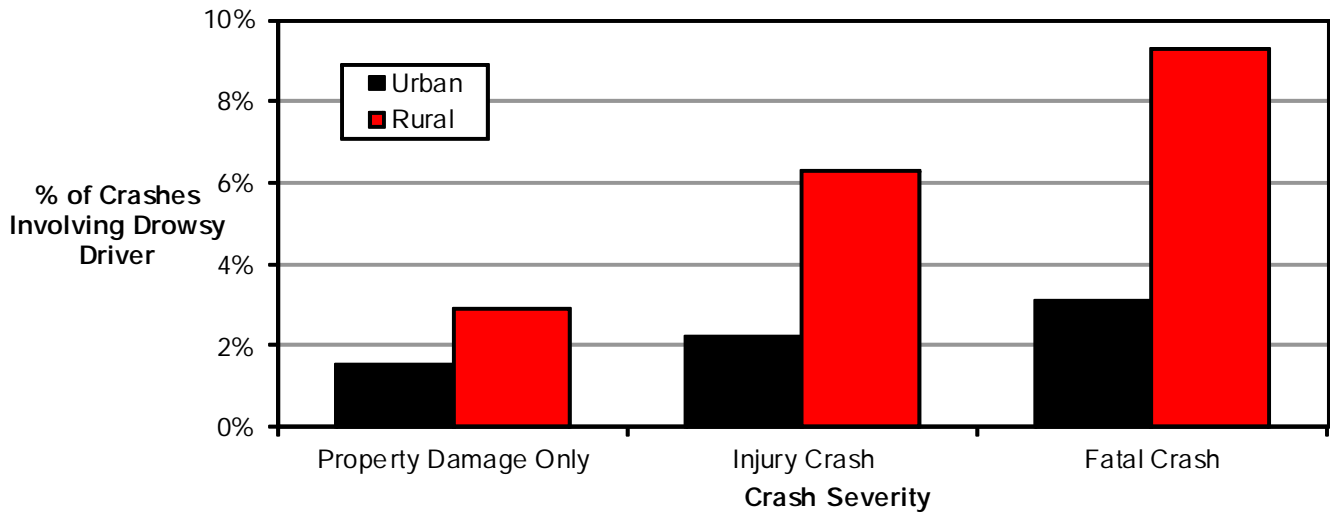
County	Drowsy Driver Crashes											
	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	All	Drowsy	%	All	Drowsy	%	All	Drowsy	%	All	Drowsy	%
	#	#	%	#	#	%	#	#	%	#	#	%
Juab	262	21	8.0%	86	10	11.6%	5	1	20.0%	353	32	9.1%
Emery	170	8	4.7%	79	13	16.5%	7	0	0.0%	256	21	8.2%
Millard	301	19	6.3%	128	14	10.9%	5	0	0.0%	434	33	7.6%
Beaver	175	9	5.1%	76	9	11.8%	0	0	n/a	251	18	7.2%
Sevier	274	12	4.4%	110	8	7.3%	6	2	33.3%	390	22	5.6%
Grand	153	5	3.3%	65	6	9.2%	4	1	25.0%	222	12	5.4%
Piute	28	1	3.6%	10	1	10.0%	1	0	0.0%	39	2	5.1%
Box Elder	972	35	3.6%	378	26	6.9%	9	1	11.1%	1,359	62	4.6%
Tooele	749	27	3.6%	340	19	5.6%	18	3	16.7%	1,107	49	4.4%
Carbon	292	8	2.7%	90	9	10.0%	3	0	0.0%	385	17	4.4%
Wasatch	554	14	2.5%	165	10	6.1%	7	0	0.0%	726	24	3.3%
Wayne	40	1	2.5%	24	1	4.2%	0	0	n/a	64	2	3.1%
Morgan	131	4	3.1%	34	1	2.9%	1	0	0.0%	166	5	3.0%
Washington	1,845	46	2.5%	847	28	3.3%	14	1	7.1%	2,706	75	2.8%
San Juan	220	4	1.8%	38	3	7.9%	8	0	0.0%	266	7	2.6%
Rich	58	1	1.7%	23	1	4.3%	0	0	n/a	81	2	2.5%
Duchesne	234	1	0.4%	67	6	9.0%	1	0	0.0%	302	7	2.3%
Summit	898	14	1.6%	291	12	4.1%	4	0	0.0%	1,193	26	2.2%
Iron	698	14	2.0%	249	5	2.0%	4	0	0.0%	951	19	2.0%
Davis	3,972	69	1.7%	1,780	45	2.5%	24	0	0.0%	5,776	114	2.0%
Utah	6,376	108	1.7%	2,960	64	2.2%	29	1	3.4%	9,365	173	1.8%
Cache	1,557	21	1.3%	496	16	3.2%	11	0	0.0%	2,064	37	1.8%
Weber	2,836	42	1.5%	1,560	35	2.2%	17	0	0.0%	4,413	77	1.7%
Salt Lake	19,674	252	1.3%	8,546	162	1.9%	67	3	4.5%	28,287	417	1.5%
Kane	156	0	0.0%	50	3	6.0%	2	0	0.0%	208	3	1.4%
Uintah	397	6	1.5%	100	1	1.0%	2	0	0.0%	499	7	1.4%
Sanpete	265	2	0.8%	95	2	2.1%	4	1	25.0%	364	5	1.4%
Garfield	165	2	1.2%	60	1	1.7%	5	0	0.0%	230	3	1.3%
Daggett	13	0	0.0%	0	0	n/a	1	0	0.0%	14	0	0.0%
Statewide	43,465	746	1.7%	18,747	511	2.7%	259	14	5.4%	62,471	1,271	2.0%

- Overall, Juab (9.1%) and Emery (8.2%) counties had the highest percentages of crashes involving a drowsy driver.
- Overall, Daggett (0.0%) and Garfield (1.3%) counties had the lowest percentages of crashes involving a drowsy driver.
- Statewide, drowsy driver crashes represented 2.0% of all crashes and 5.4% of all fatal crashes.
- Although only 1.5% of crashes in Salt Lake County involved a drowsy driver, Salt Lake was still the highest county for number of drowsy driver crashes accounting for 33% of the drowsy driver crashes in the state.

Crash Conditions

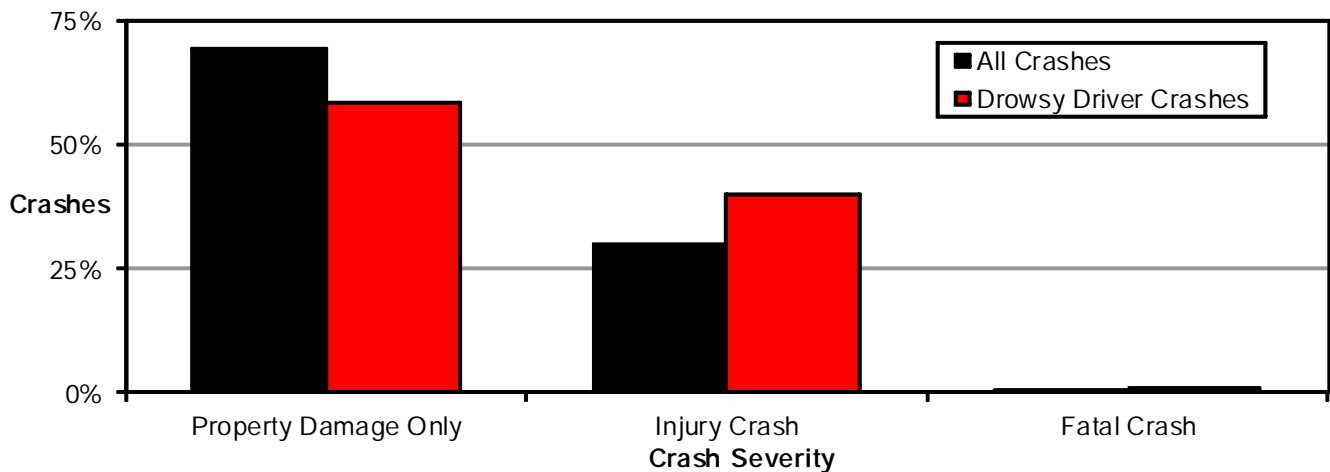
Drowsy Driver Crashes by Rural/Urban (Utah 2016)

Drowsy Driver Crashes												
Location	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	All	Drowsy		All	Drowsy		All	Drowsy		All	Drowsy	
	#	#	%	#	#	%	#	#	%	#	#	%
Rural	7,205	208	2.9%	2,558	161	6.3%	97	9	9.3%	9,860	378	3.8%
Urban	36,260	538	1.5%	16,189	350	2.2%	162	5	3.1%	52,611	893	1.7%
Statewide	43,465	746	1.7%	18,747	511	2.7%	259	14	5.4%	62,471	1,271	2.0%



- Overall, 3.8% of rural crashes involved a drowsy driver compared to 1.7% of urban crashes.
- Rural crashes were 2.3 times more likely to involve a drowsy driver than urban crashes.

Drowsy Driver Crash Severity (Utah 2016)

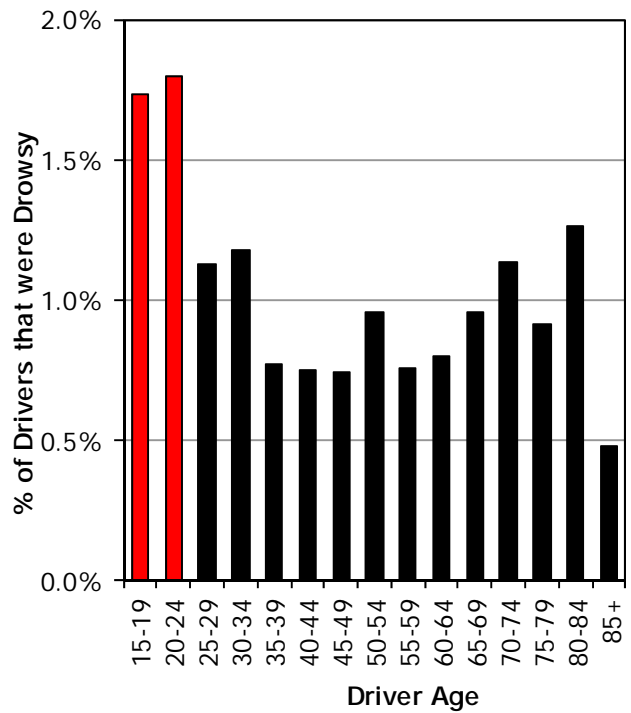
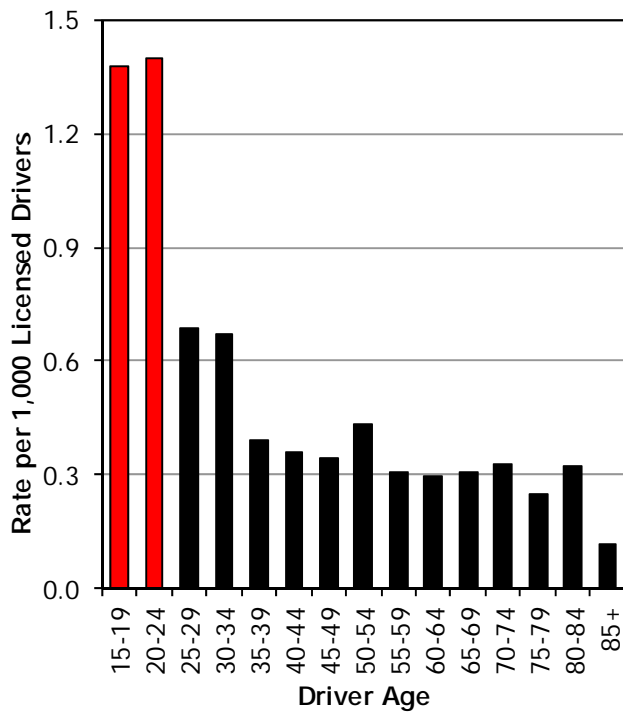


- Drowsy driver crashes were more likely to result in injury (40% to 30%) and fatality (1.1% to 0.4%) compared to all motor vehicle crashes.

Crash Conditions

Age of Drowsy Drivers in Crashes (Utah 2016)

Age	PDO Crashes				Injury Crashes				Fatal Crashes				Total			
	#	% of Age	% of All Drivs	Rate per 1,000 Drivs	#	% of Age	% of All Drivs	Rate per 1,000 Drivs	#	% of Age	% of All Drivs	Rate per 1,000 Drivs	#	% of Age	% of All Drivs	Rate per 1,000 Drivs
<15	0	0.0%	0.0%	n/a	0	0.0%	0.0%	n/a	0	0.0%	0.0%	n/a	0	0.0%	0.0%	n/a
15-19	159	21.3%	1.6%	0.87	91	17.8%	2.1%	0.50	3	21.4%	7.1%	0.016	253	19.9%	1.7%	1.38
20-24	194	26.0%	1.7%	0.90	106	20.8%	2.0%	0.49	2	14.3%	4.1%	0.009	302	23.8%	1.8%	1.40
25-29	80	10.7%	0.9%	0.37	66	12.9%	1.6%	0.31	2	14.3%	4.3%	0.009	148	11.7%	1.1%	0.69
30-34	79	10.6%	1.0%	0.39	57	11.2%	1.5%	0.28	1	7.1%	2.3%	0.005	137	10.8%	1.2%	0.67
35-39	37	5.0%	0.5%	0.18	44	8.6%	1.2%	0.21	2	14.3%	6.1%	0.009	83	6.5%	0.8%	0.39
40-44	40	5.4%	0.7%	0.22	25	4.9%	0.9%	0.14	0	0.0%	0.0%	0.000	65	5.1%	0.8%	0.36
45-49	32	4.3%	0.7%	0.21	19	3.7%	0.8%	0.12	2	14.3%	8.0%	0.013	53	4.2%	0.7%	0.34
50-54	31	4.2%	0.7%	0.22	28	5.5%	1.4%	0.20	1	7.1%	3.8%	0.007	60	4.7%	1.0%	0.43
55-59	18	2.4%	0.5%	0.12	26	5.1%	1.3%	0.18	0	0.0%	0.0%	0.000	44	3.5%	0.8%	0.31
60-64	24	3.2%	0.7%	0.18	15	2.9%	1.0%	0.11	0	0.0%	0.0%	0.000	39	3.1%	0.8%	0.29
65-69	20	2.7%	0.9%	0.19	12	2.4%	1.0%	0.11	1	7.1%	5.0%	0.009	33	2.6%	1.0%	0.31
70-74	14	1.9%	0.9%	0.18	12	2.4%	1.5%	0.15	0	0.0%	0.0%	0.000	26	2.0%	1.1%	0.33
75-79	10	1.3%	1.1%	0.19	3	0.6%	0.6%	0.06	0	0.0%	0.0%	0.000	13	1.0%	0.9%	0.25
80-84	5	0.7%	0.9%	0.15	6	1.2%	2.1%	0.18	0	0.0%	0.0%	0.000	11	0.9%	1.3%	0.32
85+	3	0.4%	0.8%	0.12	0	0.0%	0.0%	0.00	0	0.0%	0.0%	0.000	3	0.2%	0.5%	0.12
Unk	0	0.0%	0.0%	n/a	0	0.0%	0.0%	n/a	0	0.0%	0.0%	n/a	0	0.0%	0.0%	n/a
Total	746	100.0%	13.5%	0.36	510	100.0%	19.2%	0.24	14	100.0%	40.8%	0.007	1,270	100.0%	15.4%	0.61



- Drivers aged 15-24 years had the highest drowsy driving crash rates per licensed drivers.
- Drivers aged 15-24 years had the highest percent of drivers in crashes that were drowsy.

Crash Conditions

Gender of Drowsy Drivers in Crashes (Utah 2016)

Drowsy Drivers												
Gender	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	#	% of All Drivers	% of Gender	#	% of All Drivers	% of Gender	#	% of All Drivers	% of Gender	#	% of All Drivers	% of Gender
Male	556	1.3%	74.5%	342	1.8%	66.8%	12	4.1%	85.7%	910	1.4%	71.5%
Female	190	0.6%	25.5%	170	1.1%	33.2%	2	1.9%	14.3%	362	0.8%	28.5%
Unknown	0	0.0%	0.0%	0	0.0%	0.0%	0	0.0%	0.0%	0	0.0%	0.0%
Total	746	1.9%	100.0%	512	2.9%	100.0%	14	6.0%	100.0%	1,272	2.2%	100.0%

- The majority of drowsy drivers in all motor vehicle crashes (72%) were male.
- Male drivers were 1.8 times more likely to be drowsy in a crash than female drivers.
- Overall, 1.4% of male drivers in crashes were drowsy compared to 0.8% of female drivers in crashes.

Drowsy Driver Crashes by Vehicle Type (Utah 2016)

Drowsy Driver Vehicles												
Vehicle Type	Property Damage Only			Injury			Fatal			Total		
	All	Drowsy		All	Drowsy		All	Drowsy		All	Drowsy	
	#	#	%	#	#	%	#	#	%	#	#	%
RV/Motor Home	94	2	2.1%	24	0	0.0%	1	0	0.0%	119	2	1.7%
Passenger Car	40,778	446	1.1%	18,918	278	1.5%	151	4	2.6%	59,847	728	1.2%
Van	4,128	31	0.8%	2,080	36	1.7%	13	0	0.0%	6,221	67	1.1%
Pickup Truck	12,891	106	0.8%	5,016	73	1.5%	81	5	6.2%	17,988	184	1.0%
SUV	17,169	144	0.8%	7,925	111	1.4%	78	2	2.6%	25,172	257	1.0%
Heavy Truck	2,917	17	0.6%	767	12	1.6%	26	3	11.5%	3,710	32	0.9%
Bus	344	0	0.0%	73	1	1.4%	1	0	0.0%	418	1	0.2%
Motorcycle	175	0	0.0%	972	1	0.1%	41	0	0.0%	1,188	1	0.1%
Off Road Vehicle	35	0	0.0%	146	0	0.0%	9	0	0.0%	190	0	0.0%
Other	43	0	0.0%	13	0	0.0%	2	0	0.0%	58	0	0.0%
Unknown	1,241	0	0.0%	192	0	0.0%	8	0	0.0%	1,441	0	0.0%
Total	79,815	746	0.9%	36,126	512	1.4%	411	14	3.4%	116,352	1,272	1.1%

- Overall, RV/motorhome and passenger car had the highest percentages of drowsy driver vehicles in crashes.

Drowsy Driver Crashes by Day of Week (Utah 2016)

Drowsy Driver Crashes									
Day of Week	PDO Crashes		Injury Crashes		Fatal Crashes		Total		
	#	%	#	%	#	%	#	%	
Sunday	98	13.1%	64	12.5%	1	7.1%	163	12.8%	
Monday	90	12.1%	79	15.5%	1	7.1%	170	13.4%	
Tuesday	105	14.1%	65	12.7%	3	21.4%	173	13.6%	
Wednesday	116	15.5%	82	16.0%	3	21.4%	201	15.8%	
Thursday	112	15.0%	71	13.9%	3	21.4%	186	14.6%	
Friday	101	13.5%	76	14.9%	1	7.1%	178	14.0%	
Saturday	124	16.6%	74	14.5%	2	14.3%	200	15.7%	
Total	746	100.0%	511	100.0%	14	100.0%	1,271	100.0%	

- Overall, the highest percentage of drowsy driver crashes occurred on Wednesday and Saturday.

Crash Conditions

Drowsy Driver Crashes by Month (Utah 2016)

Drowsy Driver Crashes								
Month	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	41	1.3	25	0.8	1	0.03	67	2.2
February	45	1.6	23	0.8	1	0.03	69	2.4
March	49	1.6	39	1.3	1	0.03	89	2.9
April	68	2.3	43	1.4	1	0.03	112	3.7
May	71	2.3	43	1.4	2	0.06	116	3.7
June	91	3.0	54	1.8	4	0.13	149	5.0
July	74	2.4	67	2.2	1	0.03	142	4.6
August	72	2.3	44	1.4	1	0.03	117	3.8
September	57	1.9	48	1.6	0	0.00	105	3.5
October	71	2.3	44	1.4	0	0.00	115	3.7
November	56	1.9	45	1.5	2	0.07	103	3.4
December	51	1.6	36	1.2	0	0.00	87	2.8
Total	746	2.0	511	1.4	14	0.04	1,271	3.5

- Overall, the highest rate per day of drowsy driver crashes occurred in June (5.0) and July (4.6).
- Overall, the lowest rate per day of drowsy driver crashes occurred in January (2.2) and February (2.4).

Drowsy Driver Crashes

Hour	Day of Week							Total #
	Sun	Mon	Tue	Wed	Thu	Fri	Sat	
Midnight	9	6	3	9	9	9	12	57
1 a.m.	14	6	8	6	3	7	9	53
2 a.m.	13	6	5	8	7	3	7	49
3 a.m.	11	2	5	6	6	10	13	53
4 a.m.	9	10	12	8	5	10	12	66
5 a.m.	9	10	7	12	13	8	8	67
6 a.m.	11	13	11	9	12	11	17	84
7 a.m.	18	13	16	12	9	12	15	95
8 a.m.	10	11	10	11	17	8	13	80
9 a.m.	8	4	5	8	3	7	10	45
10 a.m.	1	5	2	6	6	5	6	31
11 a.m.	1	6	2	5	5	1	4	24
Noon	4	4	10	4	4	5	7	38
1 p.m.	2	8	6	10	8	8	15	57
2 p.m.	6	13	10	11	5	5	12	62
3 p.m.	3	10	14	15	10	3	9	64
4 p.m.	8	6	10	15	12	17	7	75
5 p.m.	4	12	19	8	22	12	7	84
6 p.m.	5	6	6	13	8	6	5	49
7 p.m.	3	5	2	6	5	8	4	33
8 p.m.	2	2	1	6	4	5	1	21
9 p.m.	3	6	1	1	6	4	3	24
10 p.m.	3	4	3	5	4	8	1	28
11 p.m.	6	2	4	8	3	6	3	32
Total	163	170	172	202	186	178	200	1,271

Drowsy Driver Crashes by Day of Week and Hour (Utah 2016)

- Drowsy driver crashes were highest everyday from 6:00-8:59 a.m., everyday from 2:00-5:59 p.m., and weekends 12:00-3:59 a.m.

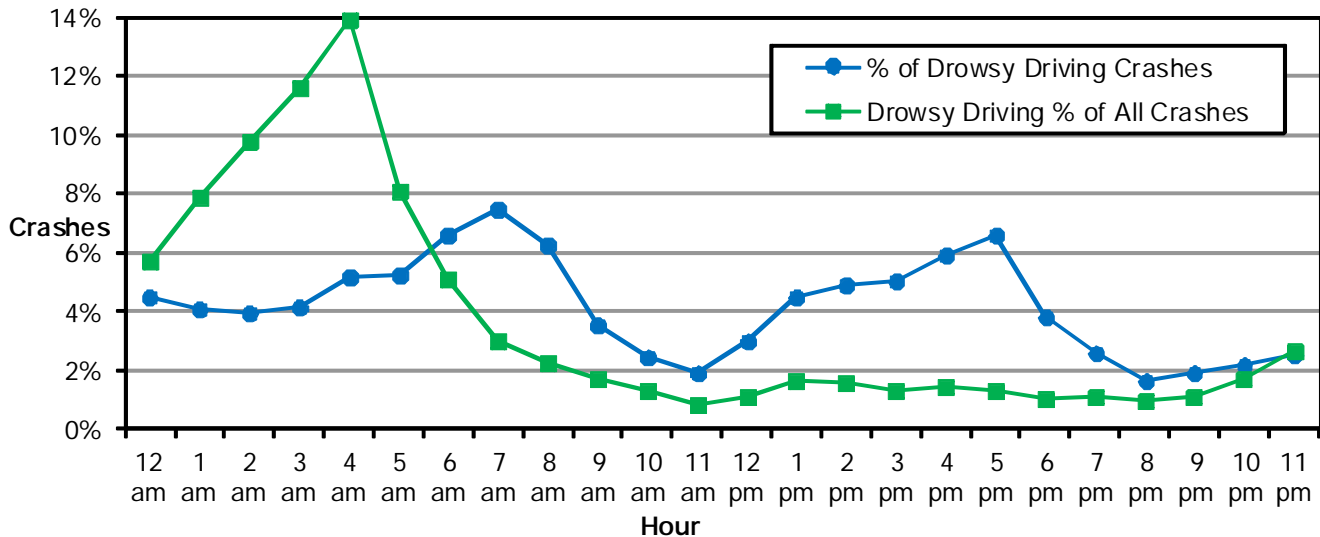
High = 10+
Medium = 6-9
Low = 0-5



Crash Conditions

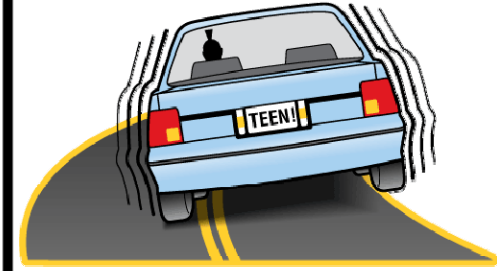
Drowsy Driver Crashes by Hour (Utah 2016)

Drowsy Driver Crashes									
Hour	PDO Crashes		Injury Crashes		Fatal Crashes		Total		
	#	%	#	%	#	%	#	%	% of All Crashes
Midnight	31	4.2%	26	5.1%	0	0.0%	57	4.5%	5.7%
1 a.m.	25	3.4%	26	5.1%	1	7.1%	52	4.1%	7.9%
2 a.m.	31	4.2%	18	3.5%	1	7.1%	50	3.9%	9.8%
3 a.m.	30	4.0%	21	4.1%	2	14.3%	53	4.2%	11.6%
4 a.m.	43	5.8%	23	4.5%	0	0.0%	66	5.2%	13.9%
5 a.m.	39	5.2%	26	5.1%	2	14.3%	67	5.3%	8.1%
6 a.m.	59	7.9%	25	4.9%	0	0.0%	84	6.6%	5.1%
7 a.m.	47	6.3%	48	9.4%	0	0.0%	95	7.5%	3.0%
8 a.m.	50	6.7%	28	5.5%	2	14.3%	80	6.3%	2.2%
9 a.m.	27	3.6%	17	3.3%	1	7.1%	45	3.5%	1.7%
10 a.m.	21	2.8%	10	2.0%	0	0.0%	31	2.4%	1.3%
11 a.m.	14	1.9%	10	2.0%	0	0.0%	24	1.9%	0.8%
Noon	24	3.2%	13	2.5%	1	7.1%	38	3.0%	1.1%
1 p.m.	26	3.5%	30	5.9%	1	7.1%	57	4.5%	1.6%
2 p.m.	39	5.2%	23	4.5%	0	0.0%	62	4.9%	1.6%
3 p.m.	37	5.0%	27	5.3%	0	0.0%	64	5.0%	1.3%
4 p.m.	40	5.4%	35	6.8%	0	0.0%	75	5.9%	1.4%
5 p.m.	51	6.8%	32	6.3%	1	7.1%	84	6.6%	1.3%
6 p.m.	28	3.8%	21	4.1%	0	0.0%	49	3.9%	1.0%
7 p.m.	19	2.5%	13	2.5%	1	7.1%	33	2.6%	1.1%
8 p.m.	10	1.3%	10	2.0%	1	7.1%	21	1.7%	0.9%
9 p.m.	16	2.1%	8	1.6%	0	0.0%	24	1.9%	1.1%
10 p.m.	19	2.5%	9	1.8%	0	0.0%	28	2.2%	1.7%
11 p.m.	20	2.7%	12	2.3%	0	0.0%	32	2.5%	2.7%
Total	746	100.0%	511	100.0%	14	100.0%	1,271	100.0%	2.0%



- Drowsy driver total crashes were highest during the hours of 6:00-8:59 a.m. and 4:00-5:59 p.m.
- The percent of crashes involving drowsy drivers was highest during the hours of 12:00-6:59 a.m.

Teenage Drivers



2

Section 8: Teenage Drivers



Trends

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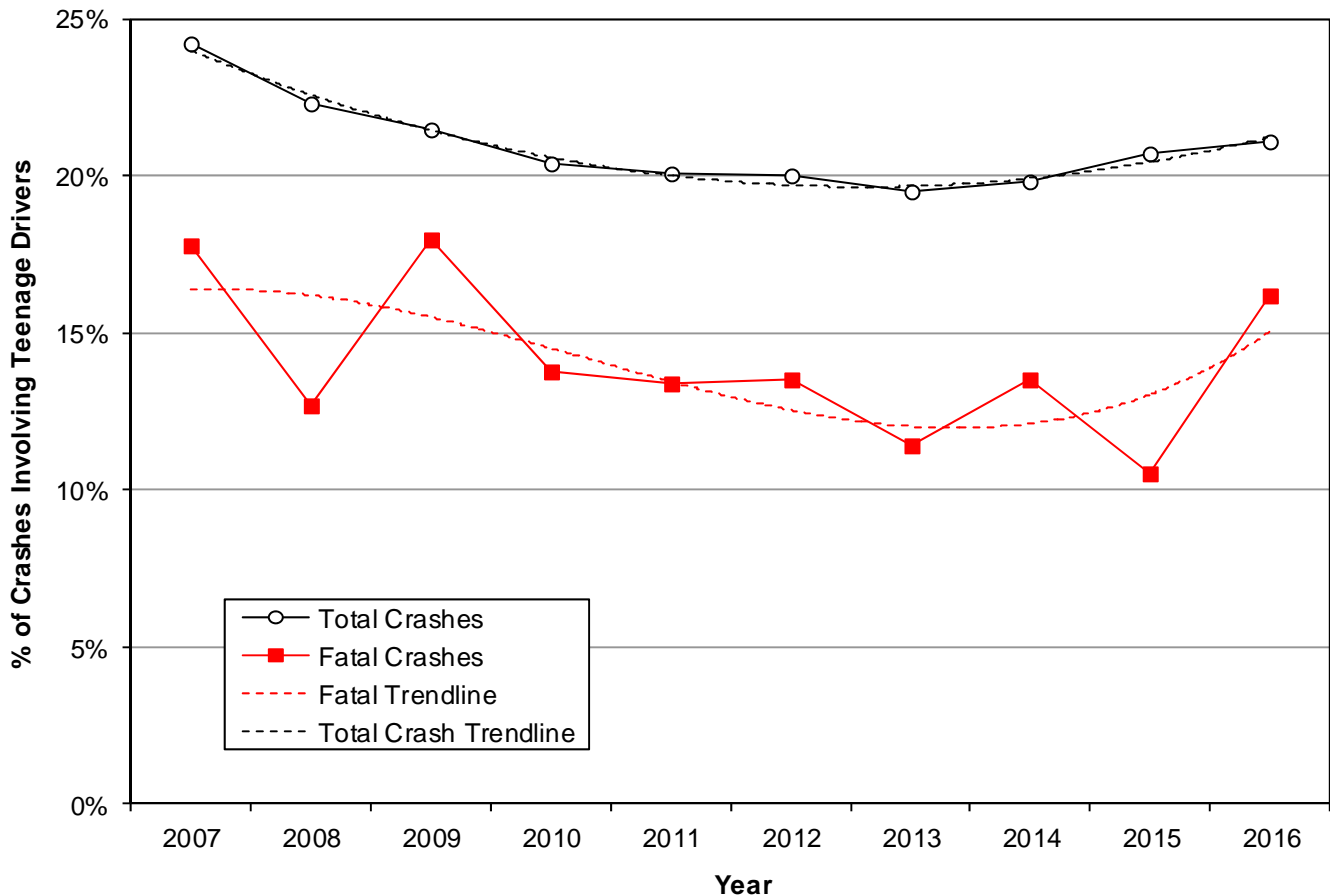
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Trends

Teenage Driver Crashes (Utah 2007-2016)

Year	Property Damage Only			Injury			Fatal			Total		
	All	Teen Driver		All	Teen Driver		All	Teen Driver		All	Teen Driver	
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	9,990	23.6%	18,619	4,808	25.8%	258	46	17.8%	61,245	14,844	24.2%
2008	38,997	8,512	21.8%	17,125	4,007	23.4%	245	31	12.7%	56,367	12,550	22.3%
2009	35,398	7,500	21.2%	15,752	3,495	22.2%	217	39	18.0%	51,367	11,034	21.5%
2010	34,155	6,886	20.2%	14,995	3,181	21.2%	218	30	13.8%	49,368	10,097	20.5%
2011	36,418	7,268	20.0%	15,645	3,227	20.6%	224	30	13.4%	52,287	10,525	20.1%
2012	34,635	6,889	19.9%	15,765	3,216	20.4%	200	27	13.5%	50,600	10,132	20.0%
2013	39,301	7,541	19.2%	16,134	3,288	20.4%	202	23	11.4%	55,637	10,852	19.5%
2014	37,388	7,288	19.5%	16,426	3,401	20.7%	222	30	13.5%	54,036	10,719	19.8%
2015	42,089	8,646	20.5%	17,665	3,722	21.1%	258	27	10.5%	60,012	12,395	20.7%
2016	43,465	9,223	21.2%	18,747	3,894	20.8%	259	42	16.2%	62,471	13,159	21.1%
Total	384,214	79,743	20.8%	166,873	36,239	21.7%	2,303	325	14.1%	553,390	116,307	21.0%

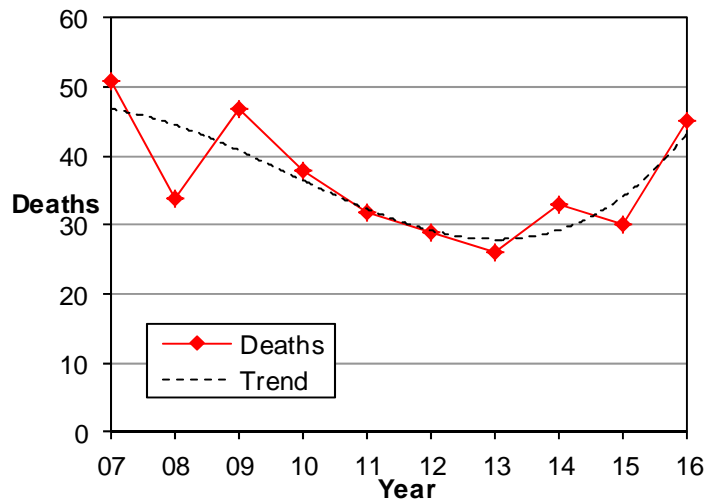


- Teenage drivers (aged 15-19 years) are a special concern because of their high crash rates and lack of driving experience.
- The 10-year trend in Utah shows that 21.0% of all crashes and 14.1% of fatal crashes involved a teenage driver.
- Teenage driver crashes had shown a decreasing trend for years, unfortunately the last few years have shown an increasing trend.

Trends

Fatal Crashes Involving Teenage Drivers (Utah 2007-2016)

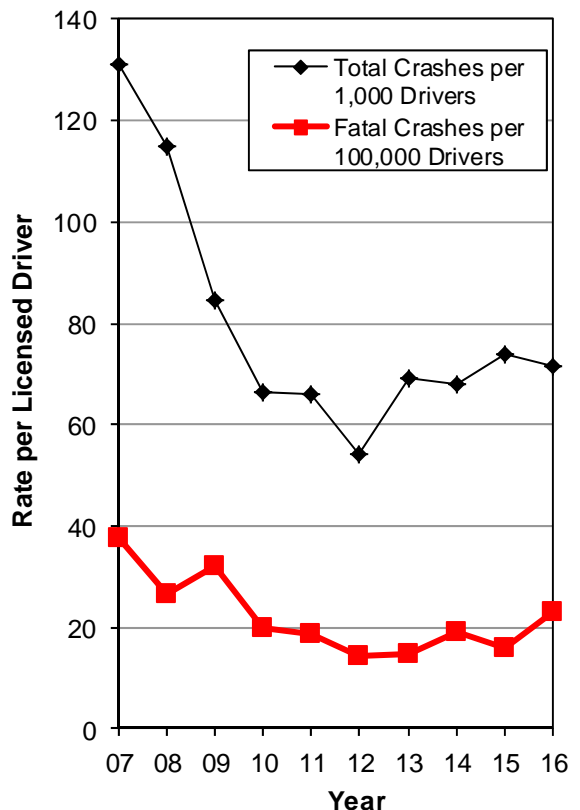
Teen Driver Crashes						
Year	Deaths			Fatal Crashes		
	All	Teen Driver	%	All	Teen Driver	%
	#	#	%	#	#	%
2007	299	51	17.1%	260	46	17.7%
2008	276	34	12.3%	244	31	12.7%
2009	244	47	19.3%	217	39	18.0%
2010	253	38	15.0%	218	30	13.8%
2011	243	32	13.2%	224	30	13.4%
2012	217	29	13.4%	200	27	13.5%
2013	220	26	11.8%	202	23	11.4%
2014	256	33	12.9%	222	30	13.5%
2015	278	30	10.8%	258	27	10.5%
2016	281	45	16.0%	259	42	16.2%
Total	2,567	365	14.2%	2,304	325	14.1%



- Over the past 10 years, the percentage of deaths and fatal crashes involving teenage drivers has fluctuated around 14% of all deaths and fatal crashes.
- On average, 37 people die a year in Utah from crashes involving a teenage driver.

Teenage Driver Crash Rates (Utah 2007-2016)

Year	Licensed Drivers	Fatal Crashes		All Crashes	
		#	Rate per 1,000 Licensed Drivers	#	Rate per 1,000 Licensed Drivers
2007	124,884	47	0.376	16,391	131.2
2008	120,039	32	0.267	13,792	114.9
2009	130,394	42	0.322	11,034	84.6
2010	151,877	30	0.198	10,097	66.5
2011	159,528	30	0.188	10,525	66.0
2012	186,586	27	0.145	10,132	54.3
2013	156,822	23	0.147	10,852	69.2
2014	157,613	30	0.190	10,719	68.0
2015	167,344	27	0.161	12,395	74.1
2016	183,665	42	0.229	13,159	71.6



- The teenage driver overall crash rate per licensed driver has shown a decreasing trend for the years 2007 to 2012 followed by an increasing trend for the years 2012-2016.
- 2007 had the highest overall crash rate per licensed driver while 2012 had the lowest overall rate.
- Over the past 10 years, the teenage driver fatal crash rate per licensed driver has shown a decreasing trend.
- 2007 had the highest fatal crash rate per licensed driver while 2012 had the lowest fatal rate.

Crash Conditions

Teenage Driver Crashes by County (Utah 2016)

County	Teenage Driver Crashes											
	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	All	Teen Driver	%	All	Teen Driver	%	All	Teen Driver	%	All	Teen Driver	%
	#	#	%	#	#	%	#	#	%	#	#	%
Sanpete	265	72	27.2%	95	27	28.4%	4	1	25.0%	364	100	27.5%
Cache	1,557	430	27.6%	496	120	24.2%	11	2	18.2%	2,064	552	26.7%
Utah	6,376	1,697	26.6%	2,960	743	25.1%	29	4	13.8%	9,365	2,444	26.1%
Washington	1,845	492	26.7%	847	210	24.8%	14	4	28.6%	2,706	706	26.1%
Davis	3,972	951	23.9%	1,780	430	24.2%	24	4	16.7%	5,776	1,385	24.0%
Weber	2,836	692	24.4%	1,560	330	21.2%	17	6	35.3%	4,413	1,028	23.3%
Uintah	397	88	22.2%	100	20	20.0%	2	1	50.0%	499	109	21.8%
Box Elder	972	204	21.0%	378	81	21.4%	9	4	44.4%	1,359	289	21.3%
Wasatch	554	121	21.8%	165	29	17.6%	7	0	0.0%	726	150	20.7%
Tooele	749	162	21.6%	340	60	17.6%	18	1	5.6%	1,107	223	20.1%
Iron	698	129	18.5%	249	55	22.1%	4	0	0.0%	951	184	19.3%
Carbon	292	51	17.5%	90	21	23.3%	3	1	33.3%	385	73	19.0%
Salt Lake	19,674	3,762	19.1%	8,546	1,585	18.5%	67	10	14.9%	28,287	5,357	18.9%
Rich	58	9	15.5%	23	5	21.7%	0	0	n/a	81	14	17.3%
Juab	262	41	15.6%	86	14	16.3%	5	1	20.0%	353	56	15.9%
Morgan	131	19	14.5%	34	7	20.6%	1	0	0.0%	166	26	15.7%
Beaver	175	25	14.3%	76	14	18.4%	0	0	n/a	251	39	15.5%
Duchesne	234	40	17.1%	67	6	9.0%	1	0	0.0%	302	46	15.2%
Sevier	274	33	12.0%	110	24	21.8%	6	0	0.0%	390	57	14.6%
Millard	301	37	12.3%	128	25	19.5%	5	1	20.0%	434	63	14.5%
Summit	898	106	11.8%	291	45	15.5%	4	0	0.0%	1,193	151	12.7%
Emery	170	16	9.4%	79	16	20.3%	7	0	0.0%	256	32	12.5%
Grand	153	11	7.2%	65	9	13.8%	4	2	50.0%	222	22	9.9%
Kane	156	11	7.1%	50	9	18.0%	2	0	0.0%	208	20	9.6%
Daggett	13	1	7.7%	0	0	n/a	1	0	0.0%	14	1	7.1%
Wayne	40	3	7.5%	24	1	4.2%	0	0	n/a	64	4	6.3%
San Juan	220	13	5.9%	38	2	5.3%	8	0	0.0%	266	15	5.6%
Garfield	165	7	4.2%	60	5	8.3%	5	0	0.0%	230	12	5.2%
Piute	28	0	0.0%	10	1	10.0%	1	0	0.0%	39	1	2.6%
Statewide	43,465	9,223	21.2%	18,747	3,894	20.8%	259	42	16.2%	62,471	13,159	21.1%

- Overall, Sanpete (28%), Cache (27%), Utah (26%), and Washington (26%) counties had the highest percentages of crashes involving a teenage driver.
- Overall, Piute (3%), Garfield (5%), and San Juan (6%) counties had the lowest percentages of crashes involving a teenage driver.
- Statewide, teenage driver crashes represented 21.1% of all crashes and 16.2% of all fatal crashes.

Previous Driving Violations of Teens in Fatal Crashes (Utah 2016)

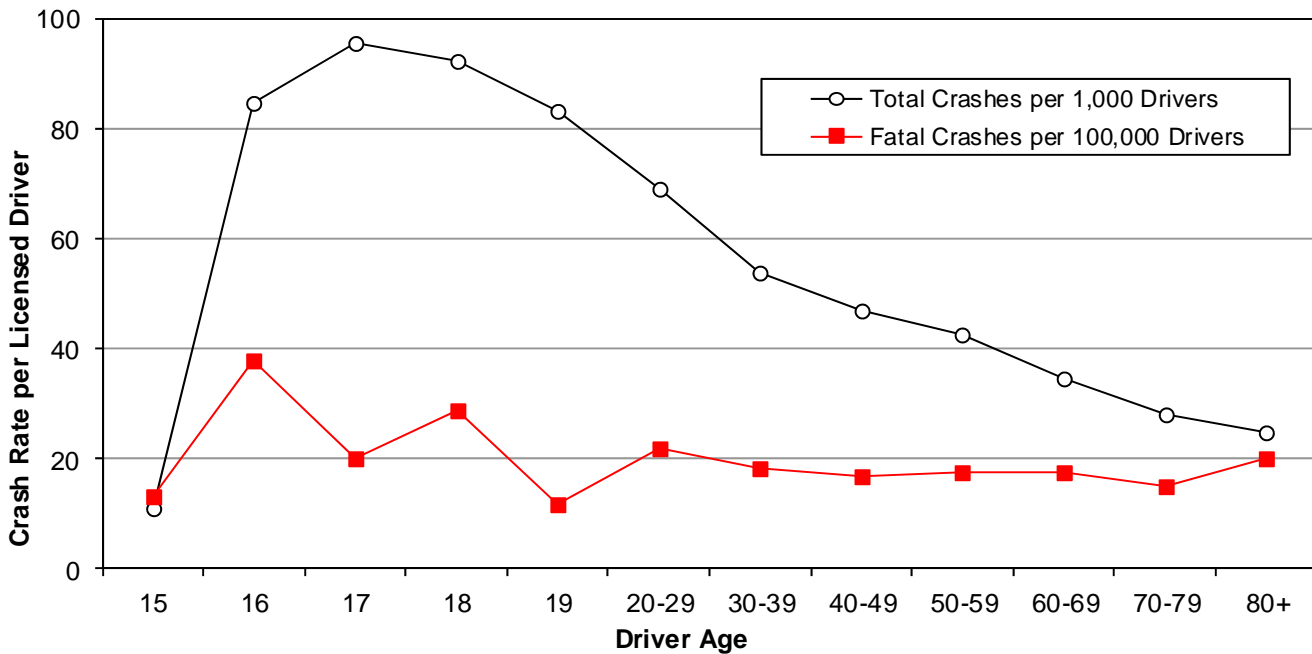


- Of the 42 teenage drivers in fatal crashes, 4 (10%) had been previously convicted of a moving traffic violation in the past five years. The highest number of violations by one teen driver was 11 in the past five years.

Crash Conditions

Age of Teenage Drivers in Crashes (Utah 2016)

Teenage Drivers												
Age	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers
15	153	1.5%	6.7	91	2.1%	4.0	3	7.1%	0.132	247	1.7%	10.9
16	2,259	22.0%	61.2	857	19.9%	23.2	14	33.3%	0.379	3,130	21.4%	84.8
17	2,694	26.3%	67.7	1,105	25.7%	27.8	8	19.0%	0.201	3,807	26.1%	95.6
18	2,714	26.5%	65.2	1,128	26.3%	27.1	12	28.6%	0.288	3,854	26.4%	92.5
19	2,435	23.7%	57.1	1,115	26.0%	26.2	5	11.9%	0.117	3,555	24.4%	83.4
Total	10,255	100.0%	55.8	4,296	100.0%	23.4	42	100.0%	0.229	14,593	100.0%	79.5



- Drivers aged 17 years had the highest total crash rate per licensed driver.
- Drivers aged 16 years had the highest fatal crash rate per licensed driver.

Gender of Teenage Drivers in Crashes (Utah 2016)

Teenage Drivers								
Gender	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Male	5,352	52.2%	2,101	48.9%	24	57.1%	7,477	51.2%
Female	4,899	47.8%	2,194	51.1%	18	42.9%	7,111	48.7%
Unknown	4	0.0%	1	0.0%	0	0.0%	5	0.0%
Total	10,255	100.0%	4,296	100.0%	42	100.0%	14,593	100.0%

- The majority of teen drivers in all motor vehicle crashes (51%) and fatal crashes (57%) were male.
- The majority of teen drivers in injury crashes (51%) were female.

Crash Conditions

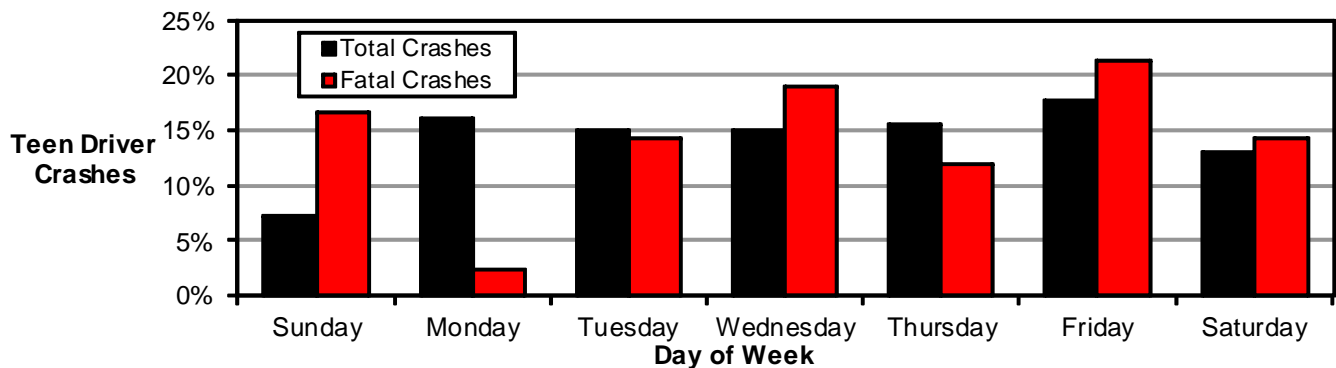
Teenage Driver Crashes by Month (Utah 2016)

Teenage Driver Crashes								
Month	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	887	28.6	304	9.8	0	0.00	1,191	38.4
February	741	25.6	264	9.1	4	0.14	1,009	34.8
March	681	22.0	330	10.6	1	0.03	1,012	32.6
April	681	22.7	284	9.5	3	0.10	968	32.3
May	760	24.5	329	10.6	7	0.23	1,096	35.4
June	644	21.5	348	11.6	7	0.23	999	33.3
July	606	19.5	340	11.0	2	0.06	948	30.6
August	756	24.4	332	10.7	3	0.10	1,091	35.2
September	875	29.2	382	12.7	4	0.13	1,261	42.0
October	797	25.7	323	10.4	3	0.10	1,123	36.2
November	939	31.3	336	11.2	6	0.20	1,281	42.7
December	856	27.6	322	10.4	2	0.06	1,180	38.1
Total	9,223	25.2	3,894	10.6	42	0.11	13,159	36.0

- Overall, November (42.7) and September (42.0) had the highest rates per day for teenage driver crashes.
- The highest rate per day of fatal teenage driver crashes occurred in May and June (0.23).

Teenage Driver Crashes by Day of Week (Utah 2016)

Teenage Driver Crashes								
Day of Week	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Sunday	678	7.4%	275	7.1%	7	16.7%	960	7.3%
Monday	1,486	16.1%	638	16.4%	1	2.4%	2,125	16.1%
Tuesday	1,399	15.2%	573	14.7%	6	14.3%	1,978	15.0%
Wednesday	1,365	14.8%	612	15.7%	8	19.0%	1,985	15.1%
Thursday	1,465	15.9%	577	14.8%	5	11.9%	2,047	15.6%
Friday	1,660	18.0%	675	17.3%	9	21.4%	2,344	17.8%
Saturday	1,170	12.7%	544	14.0%	6	14.3%	1,720	13.1%
Total	9,223	100.0%	3,894	100.0%	42	100.0%	13,159	100.0%

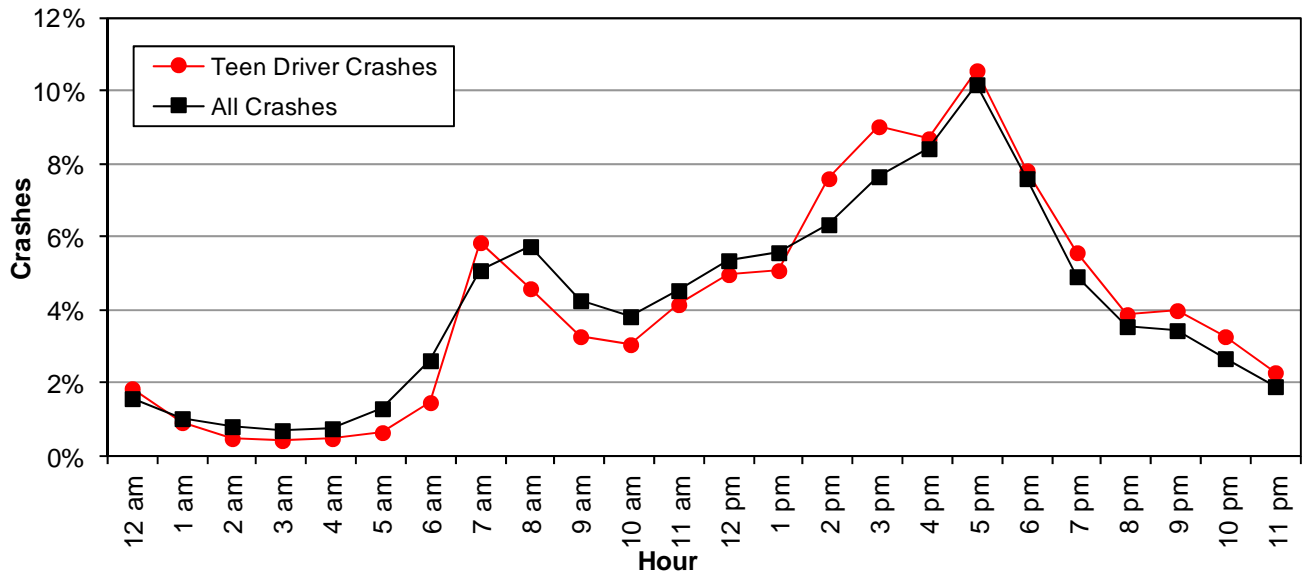


- Overall, the highest percentage of teenage driver crashes occurred on Friday (18%).
- The highest percentage of fatal teenage driver crashes occurred on Friday (21%).

Crash Conditions

Teenage Driver Crashes by Hour (Utah 2016)

Teenage Driver Crashes								
Hour	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Midnight	176	1.9%	69	1.8%	1	2.4%	246	1.9%
1 a.m.	74	0.8%	41	1.1%	3	7.1%	118	0.9%
2 a.m.	43	0.5%	22	0.6%	2	4.8%	67	0.5%
3 a.m.	31	0.3%	23	0.6%	2	4.8%	56	0.4%
4 a.m.	43	0.5%	22	0.6%	0	0.0%	65	0.5%
5 a.m.	60	0.7%	23	0.6%	0	0.0%	83	0.6%
6 a.m.	146	1.6%	44	1.1%	0	0.0%	190	1.4%
7 a.m.	558	6.1%	209	5.4%	1	2.4%	768	5.8%
8 a.m.	455	4.9%	148	3.8%	0	0.0%	603	4.6%
9 a.m.	307	3.3%	124	3.2%	0	0.0%	431	3.3%
10 a.m.	283	3.1%	117	3.0%	0	0.0%	400	3.0%
11 a.m.	386	4.2%	159	4.1%	2	4.8%	547	4.2%
Noon	466	5.1%	185	4.8%	1	2.4%	652	5.0%
1 p.m.	477	5.2%	190	4.9%	4	9.5%	671	5.1%
2 p.m.	714	7.7%	283	7.3%	1	2.4%	998	7.6%
3 p.m.	839	9.1%	344	8.8%	3	7.1%	1,186	9.0%
4 p.m.	795	8.6%	354	9.1%	0	0.0%	1,149	8.7%
5 p.m.	948	10.3%	441	11.3%	0	0.0%	1,389	10.6%
6 p.m.	695	7.5%	335	8.6%	4	9.5%	1,034	7.9%
7 p.m.	517	5.6%	209	5.4%	8	19.0%	734	5.6%
8 p.m.	359	3.9%	149	3.8%	3	7.1%	511	3.9%
9 p.m.	349	3.8%	177	4.5%	0	0.0%	526	4.0%
10 p.m.	296	3.2%	132	3.4%	3	7.1%	431	3.3%
11 p.m.	206	2.2%	94	2.4%	4	9.5%	304	2.3%
Total	9,223	100.0%	3,894	100.0%	42	100.0%	13,159	100.0%



- Teenage driver total crashes were highest from 2:00 p.m. to 6:59 p.m. (after-school hours).
- Teenage driver crashes were more likely to occur in the afternoon and evening than other crashes.

Crash Conditions

Teenage Driver Crashes by Day of Week and Hour (Utah 2016)

Teenage Driver Crashes								
Hour	Day of Week							Total #
	Sun	Mon	Tue	Wed	Thu	Fri	Sat	
Midnight	41	30	21	24	37	32	62	247
1 a.m.	32	11	3	10	13	18	32	119
2 a.m.	22	6	5	6	3	8	16	66
3 a.m.	9	7	10	3	4	12	10	55
4 a.m.	14	10	4	4	7	8	18	65
5 a.m.	14	17	7	10	12	13	10	83
6 a.m.	17	35	31	21	26	42	18	190
7 a.m.	29	137	142	143	157	123	36	767
8 a.m.	28	100	143	102	81	103	47	604
9 a.m.	32	72	65	75	71	63	53	431
10 a.m.	37	55	62	55	57	67	67	400
11 a.m.	34	101	77	78	83	92	82	547
Noon	28	94	87	111	116	100	116	652
1 p.m.	56	126	89	78	79	128	115	671
2 p.m.	68	195	136	155	153	179	112	998
3 p.m.	52	200	205	200	176	236	117	1,186
4 p.m.	61	196	196	181	185	207	123	1,149
5 p.m.	65	218	244	241	249	234	138	1,389
6 p.m.	73	159	167	168	157	202	108	1,034
7 p.m.	68	112	89	117	118	128	102	734
8 p.m.	47	82	67	58	89	86	82	511
9 p.m.	51	77	59	63	83	117	76	526
10 p.m.	39	56	36	49	60	90	100	430
11 p.m.	42	29	33	34	31	54	81	304
Total	959	2,125	1,978	1,986	2,047	2,342	1,721	13,158

High = 100+
Medium = 36-99
Low = 0-35

- Teenage driver crashes were highest everyday Monday to Saturday from 2:00 p.m. to 7:59 p.m. There was also a peak in the weekday morning during the 7:00 and 8:00 a.m. hours.
- Teenage driver crashes were lowest everyday from midnight to 6:59 a.m.

Travel Speed of Teenage Driver Vehicles in Crashes (Utah 2016)

- Nearly two-thirds (61% of known) of teen driver vehicles in total crashes were traveling 1-39 MPH.
- In contrast, teenage driver vehicles in fatal crashes were more likely to be traveling at higher speeds. The majority (76% of known) of teenage driver vehicles in fatal crashes were traveling 40 MPH or higher.
- Crashes involving teenage driver vehicles traveling 40 MPH or higher were 7.8 times more likely to be fatal.

Teenage Driver Vehicles								
Travel Speed	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Stopped	811	7.9%	360	8.4%	2	4.8%	1,173	8.0%
1-9 MPH	1,175	11.5%	318	7.4%	2	4.8%	1,495	10.2%
10-19 MPH	1,565	15.3%	603	14.0%	1	2.4%	2,169	14.9%
20-29 MPH	1,238	12.1%	475	11.1%	2	4.8%	1,715	11.8%
30-39 MPH	1,208	11.8%	568	13.2%	2	4.8%	1,778	12.2%
40-49 MPH	776	7.6%	486	11.3%	8	19.0%	1,270	8.7%
50-59 MPH	498	4.9%	207	4.8%	8	19.0%	713	4.9%
60-69 MPH	445	4.3%	193	4.5%	5	11.9%	643	4.4%
70-79 MPH	377	3.7%	188	4.4%	3	7.1%	568	3.9%
80-89 MPH	70	0.7%	45	1.0%	2	4.8%	117	0.8%
90+ MPH	7	0.1%	12	0.3%	2	4.8%	21	0.1%
Unknown	2,085	20.3%	841	19.6%	5	11.9%	2,931	20.1%
Total	10,255	100.0%	4,296	100.0%	42	100.0%	14,593	100.0%

Crash Conditions

Number of Occupants in Teenage Driven Vehicles (Utah 2016)

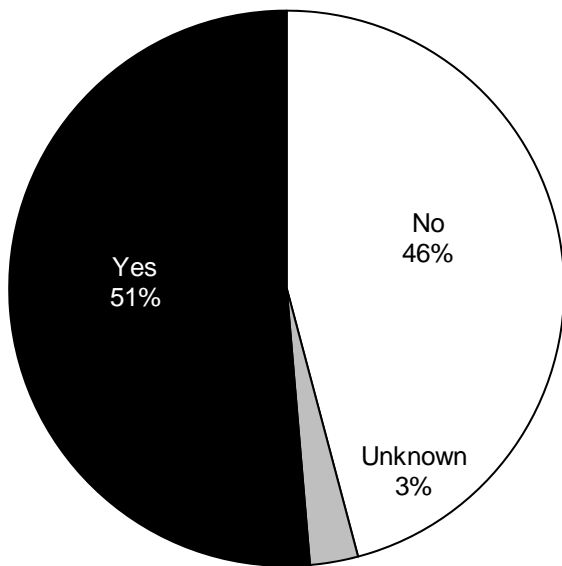
Teenage Driven Vehicles								
Number of Occupants	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
1	7,629	74.4%	2,790	64.9%	19	45.2%	10,438	71.5%
2	1,805	17.6%	984	22.9%	12	28.6%	2,801	19.2%
3	536	5.2%	321	7.5%	4	9.5%	861	5.9%
4 or more	285	2.8%	201	4.7%	7	16.7%	493	3.4%
Total	10,255	100.0%	4,296	100.0%	42	100.0%	14,593	100.0%

- Over two-thirds of teenage driven vehicles (72%) in crashes contained only the teenage driver.
- Teenage driven vehicles with passengers were more likely to be in injury or fatal crashes.
- Teenage driver vehicles with passengers in crashes were 3.0 times more likely to be fatal than crashes with only the teenage driver.

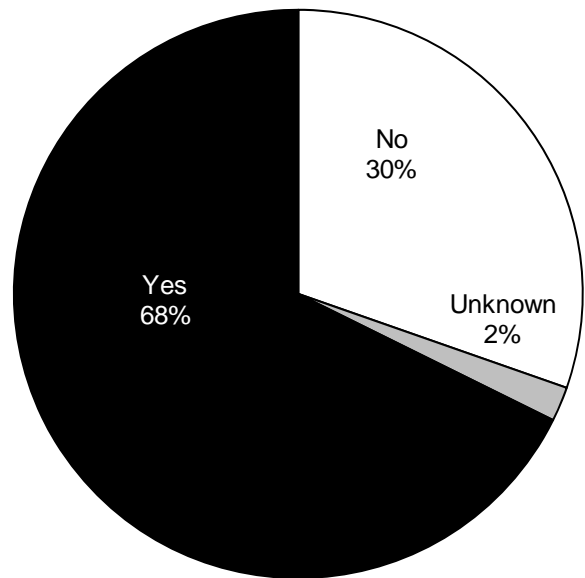
Teenage Drivers with Contributing Factors in Crashes (Utah 2016)

Teenage Drivers/Vehicles								
Driver/Vehicle with a Contributing Factor(s)	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Yes	6,836	66.7%	3,017	70.2%	23	54.8%	9,876	67.7%
No	3,211	31.3%	1,201	28.0%	18	42.9%	4,430	30.4%
Unknown	208	2.0%	78	1.8%	1	2.4%	287	2.0%
Total	10,255	100.0%	4,296	100.0%	42	100.0%	14,593	100.0%

All Drivers



Teenage Drivers



- Some form of poor driver performance is present in the majority of crashes.
- 68.7% of teenage drivers had a contributing factor in total crashes.
- Teenage drivers were 2.2 times more likely to have a contributing factor in a crash than drivers of other ages.

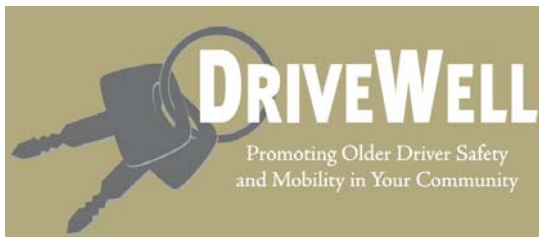
Crash Conditions

Contributing Factors of Teenage Driver Crashes (Utah 2016)

Teenage Drivers/Vehicles								
Contributing Factors	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Followed Too Closely	1,970	19.2%	848	17.8%	1	2.2%	2,819	18.7%
Failed to Yield Right of Way	1,535	14.9%	861	18.1%	6	13.0%	2,402	15.9%
Speed Too Fast	1,233	12.0%	476	10.0%	7	15.2%	1,716	11.4%
Driver Distraction	727	7.1%	423	8.9%	6	13.0%	1,156	7.7%
Failed to Keep in Proper Lane	758	7.4%	325	6.8%	1	2.2%	1,084	7.2%
Other Improper Driving	434	4.2%	227	4.8%	0	0.0%	661	4.4%
Vision Obscured by Weather Condition	472	4.6%	119	2.5%	1	2.2%	592	3.9%
Improper Turn	394	3.8%	163	3.4%	1	2.2%	558	3.7%
Disregard Traffic Signal/Sign	274	2.7%	243	5.1%	0	0.0%	517	3.4%
Ran Off Road	270	2.6%	124	2.6%	7	15.2%	401	2.7%
Improper Lane Change	315	3.1%	46	1.0%	1	2.2%	362	2.4%
Overcorrected	156	1.5%	112	2.4%	1	2.2%	269	1.8%
Improper Backing	254	2.5%	14	0.3%	0	0.0%	268	1.8%
Driver Asleep/Fatigue	159	1.5%	91	1.9%	3	6.5%	253	1.7%
Swerved or Evasive Action	149	1.4%	89	1.9%	0	0.0%	238	1.6%
Improper Parking/Stopping	154	1.5%	48	1.0%	0	0.0%	202	1.3%
Vehicle Other Defective Condition	106	1.0%	49	1.0%	0	0.0%	155	1.0%
Vision Obscured by Moving Vehicle	102	1.0%	52	1.1%	1	2.2%	155	1.0%
Driving Under the Influence	85	0.8%	67	1.4%	0	0.0%	152	1.0%
Vehicle Brakes	93	0.9%	53	1.1%	0	0.0%	146	1.0%
Hit and Run	106	1.0%	25	0.5%	1	2.2%	132	0.9%
Reckless/Aggressive Driving	67	0.7%	57	1.2%	3	6.5%	127	0.8%
Vehicle Tires	82	0.8%	20	0.4%	1	2.2%	103	0.7%
Vision Obscured by Glare	63	0.6%	25	0.5%	0	0.0%	88	0.6%
Vision Obscured by Parked Vehicle	59	0.6%	26	0.5%	0	0.0%	85	0.6%
Vision Obscured by Other	40	0.4%	30	0.6%	0	0.0%	70	0.5%
Driver Emotional Prior to Crash	32	0.3%	34	0.7%	1	2.2%	67	0.4%
Improper Passing	46	0.4%	9	0.2%	0	0.0%	55	0.4%
Driver Condition Other	30	0.3%	24	0.5%	0	0.0%	54	0.4%
Wrong Side/Wrong Way	23	0.2%	22	0.5%	2	4.3%	47	0.3%
Windshield or Other Window Obscured	30	0.3%	12	0.3%	0	0.0%	42	0.3%
Disregard Road Markings	17	0.2%	9	0.2%	2	4.3%	28	0.2%
Driver Illness/Medical	9	0.1%	17	0.4%	0	0.0%	26	0.2%
Vision Obscured by Vegetation	15	0.1%	7	0.1%	0	0.0%	22	0.1%
Vision Obscured by Building, Sign, etc.	12	0.1%	8	0.2%	0	0.0%	20	0.1%
Improper Signal	13	0.1%	2	0.0%	0	0.0%	15	0.1%
Total	10,284	100.0%	4,757	100.0%	46	100.0%	15,087	100.0%

- Some form of poor driver performance is present in the majority of crashes. The leading contributing factors for all teenage driver crashes were followed too closely (19%), failed to yield right of way (16%), speed too fast (11%), and driver distraction (8%).
- The leading contributing factors in fatal teenage driver crashes were speed too fast (15%) and ran off road (15%).
- Compared to drivers of all ages, teenage drivers were more likely to have a contributing factor of failure to yield right of way, followed too closely, and driver distraction.
- The contributing factors that contributed more to injury crashes than non-injury crashes were: failure to yield right of way, followed too closely, speed too fast, and driver distraction.

Older (Age 65+) Drivers



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Section 9: Older (Age 65+) Drivers



Trends

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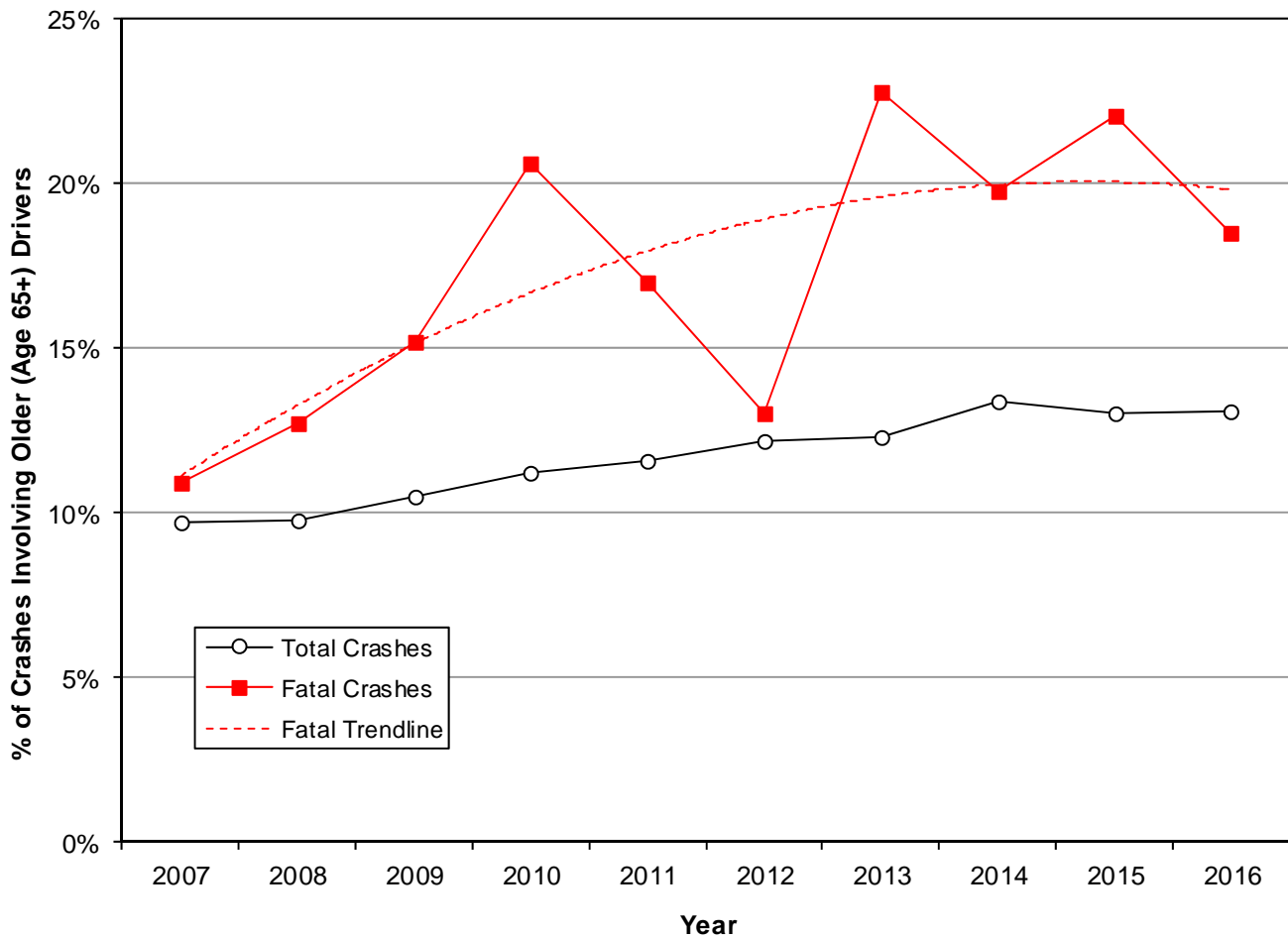
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Trends

Older Driver Crashes (Utah 2007-2016)

Older (Age 65+) Driver Crashes												
Year	Property Damage Only			Injury			Fatal			Total		
	All	Older Driver		All	Older Driver		All	Older Driver		All	Older Driver	
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	3,937	9.3%	18,619	1,991	10.7%	258	28	10.9%	61,245	5,956	9.7%
2008	38,997	3,620	9.3%	17,125	1,872	10.9%	245	31	12.7%	56,367	5,523	9.8%
2009	35,398	3,552	10.0%	15,752	1,834	11.6%	217	33	15.2%	51,367	5,419	10.5%
2010	34,155	3,658	10.7%	14,995	1,830	12.2%	218	45	20.6%	49,368	5,533	11.2%
2011	36,418	4,108	11.3%	15,645	1,914	12.2%	224	38	17.0%	52,287	6,060	11.6%
2012	34,635	4,043	11.7%	15,765	2,080	13.2%	200	26	13.0%	50,600	6,149	12.2%
2013	39,301	4,627	11.8%	16,134	2,182	13.5%	202	46	22.8%	55,637	6,855	12.3%
2014	37,388	4,838	12.9%	16,426	2,372	14.4%	222	44	19.8%	54,036	7,254	13.4%
2015	42,089	5,274	12.5%	17,665	2,482	14.1%	258	57	22.1%	60,012	7,813	13.0%
2016	43,465	5,378	12.4%	18,747	2,754	14.7%	259	48	18.5%	62,471	8,180	13.1%
Total	384,214	43,035	11.2%	166,873	21,311	12.8%	2,303	396	17.2%	553,390	64,742	11.7%

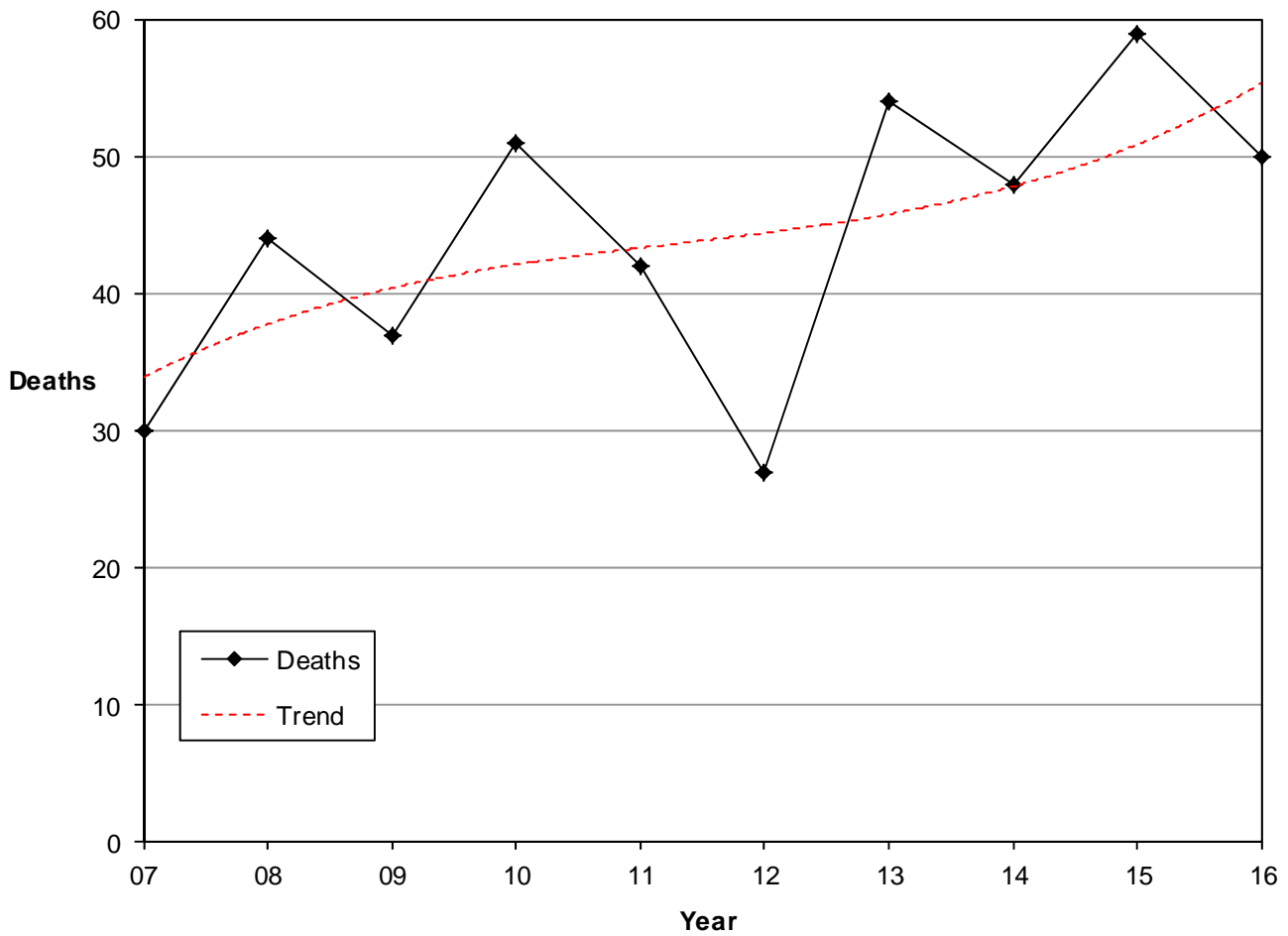


- Older drivers (aged 65+ years) are a special concern because of their declining health and fragility.
- The 10-year trend shows that 11.7% of all crashes in Utah involved an older driver with an increasing trend over the last 10 years.
- Fatal older driver crashes have also shown an increasing trend over the last 10 years.

Trends

Fatal Crashes Involving Older Drivers (Utah 2007-2016)

Year	Older Driver Crashes					
	Deaths			Fatal Crashes		
	All #	Older Driver #	%	All #	Older Driver #	%
2007	299	30	10.0%	260	28	10.8%
2008	276	44	15.9%	244	31	12.7%
2009	244	37	15.2%	217	33	15.2%
2010	253	51	20.2%	218	45	20.6%
2011	243	42	17.3%	224	38	17.0%
2012	217	27	12.4%	200	26	13.0%
2013	220	54	24.5%	202	46	22.8%
2014	256	48	18.8%	222	44	19.8%
2015	278	59	21.2%	258	57	22.1%
2016	281	50	17.8%	259	48	18.5%
Total	2,567	442	17.2%	2,304	396	17.2%



- Over the past 10 years, the percentage of deaths and fatal crashes involving older drivers has fluctuated around 17% of all deaths and fatal crashes.
- On average, 44 people die a year in Utah from crashes involving an older driver.

Crash Conditions

Older Driver Crashes by County (Utah 2016)

Older (Age 65+) Driver Crashes												
County	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	All	Older Driver		All	Older Driver		All	Older Driver		All	Older Driver	
	#	#	%	#	#	%	#	#	%	#	#	%
Piute	28	6	21.4%	10	3	30.0%	1	0	0.0%	39	9	23.1%
Washington	1,845	391	21.2%	847	197	23.3%	14	3	21.4%	2,706	591	21.8%
Daggett	13	2	15.4%	0	0	n/a	1	1	100.0%	14	3	21.4%
Grand	153	31	20.3%	65	14	21.5%	4	0	0.0%	222	45	20.3%
Carbon	292	42	14.4%	90	20	22.2%	3	1	33.3%	385	63	16.4%
Garfield	165	25	15.2%	60	10	16.7%	5	2	40.0%	230	37	16.1%
Sanpete	265	35	13.2%	95	20	21.1%	4	2	50.0%	364	57	15.7%
Sevier	274	46	16.8%	110	12	10.9%	6	1	16.7%	390	59	15.1%
Weber	2,836	377	13.3%	1,560	284	18.2%	17	3	17.6%	4,413	664	15.0%
Iron	698	106	15.2%	249	35	14.1%	4	1	25.0%	951	142	14.9%
Davis	3,972	527	13.3%	1,780	287	16.1%	24	4	16.7%	5,776	818	14.2%
Emery	170	24	14.1%	79	9	11.4%	7	3	42.9%	256	36	14.1%
Wayne	40	5	12.5%	24	4	16.7%	0	0	n/a	64	9	14.1%
San Juan	220	30	13.6%	38	6	15.8%	8	1	12.5%	266	37	13.9%
Box Elder	972	131	13.5%	378	53	14.0%	9	2	22.2%	1,359	186	13.7%
Juab	262	37	14.1%	86	9	10.5%	5	1	20.0%	353	47	13.3%
Cache	1,557	191	12.3%	496	79	15.9%	11	2	18.2%	2,064	272	13.2%
Uintah	397	46	11.6%	100	18	18.0%	2	1	50.0%	499	65	13.0%
Beaver	175	20	11.4%	76	12	15.8%	0	0	n/a	251	32	12.7%
Wasatch	554	62	11.2%	165	25	15.2%	7	2	28.6%	726	89	12.3%
Salt Lake	19,674	2,316	11.8%	8,546	1,134	13.3%	67	9	13.4%	28,287	3,459	12.2%
Tooele	749	84	11.2%	340	44	12.9%	18	2	11.1%	1,107	130	11.7%
Millard	301	32	10.6%	128	18	14.1%	5	0	0.0%	434	50	11.5%
Utah	6,376	654	10.3%	2,960	413	14.0%	29	7	24.1%	9,365	1,074	11.5%
Summit	898	107	11.9%	291	29	10.0%	4	0	0.0%	1,193	136	11.4%
Kane	156	17	10.9%	50	6	12.0%	2	0	0.0%	208	23	11.1%
Duchesne	234	21	9.0%	67	12	17.9%	1	0	0.0%	302	33	10.9%
Morgan	131	10	7.6%	34	1	2.9%	1	0	0.0%	166	11	6.6%
Rich	58	3	5.2%	23	0	0.0%	0	0	n/a	81	3	3.7%
Statewide	43,465	5,378	12.4%	18,747	2,754	14.7%	259	48	18.5%	62,471	8,180	13.1%

- Overall, Piute (23%), Washington (22%), and Daggett (21%) counties had the highest percentages of crashes involving an older driver.
- Salt Lake and Utah counties had the highest amount of fatal crashes involving an older driver.
- Overall, Rich (4%), Morgan (7%), and Duchesne (11%) counties had the lowest percentages of crashes involving an older driver.
- Statewide, older driver crashes represented 13.1% of all crashes and 18.5% of all fatal crashes.

Crash Conditions

Gender of Older Drivers in Crashes (Utah 2016)

Older (Age 65+) Drivers								
Gender	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Male	3,421	60.2%	1,694	58.0%	40	76.9%	5,155	59.5%
Female	2,257	39.7%	1,229	42.0%	12	23.1%	3,498	40.4%
Unknown	5	0.1%	0	0.0%	0	0.0%	5	0.1%
Total	5,683	100.0%	2,923	100.0%	52	100.0%	8,658	100.0%

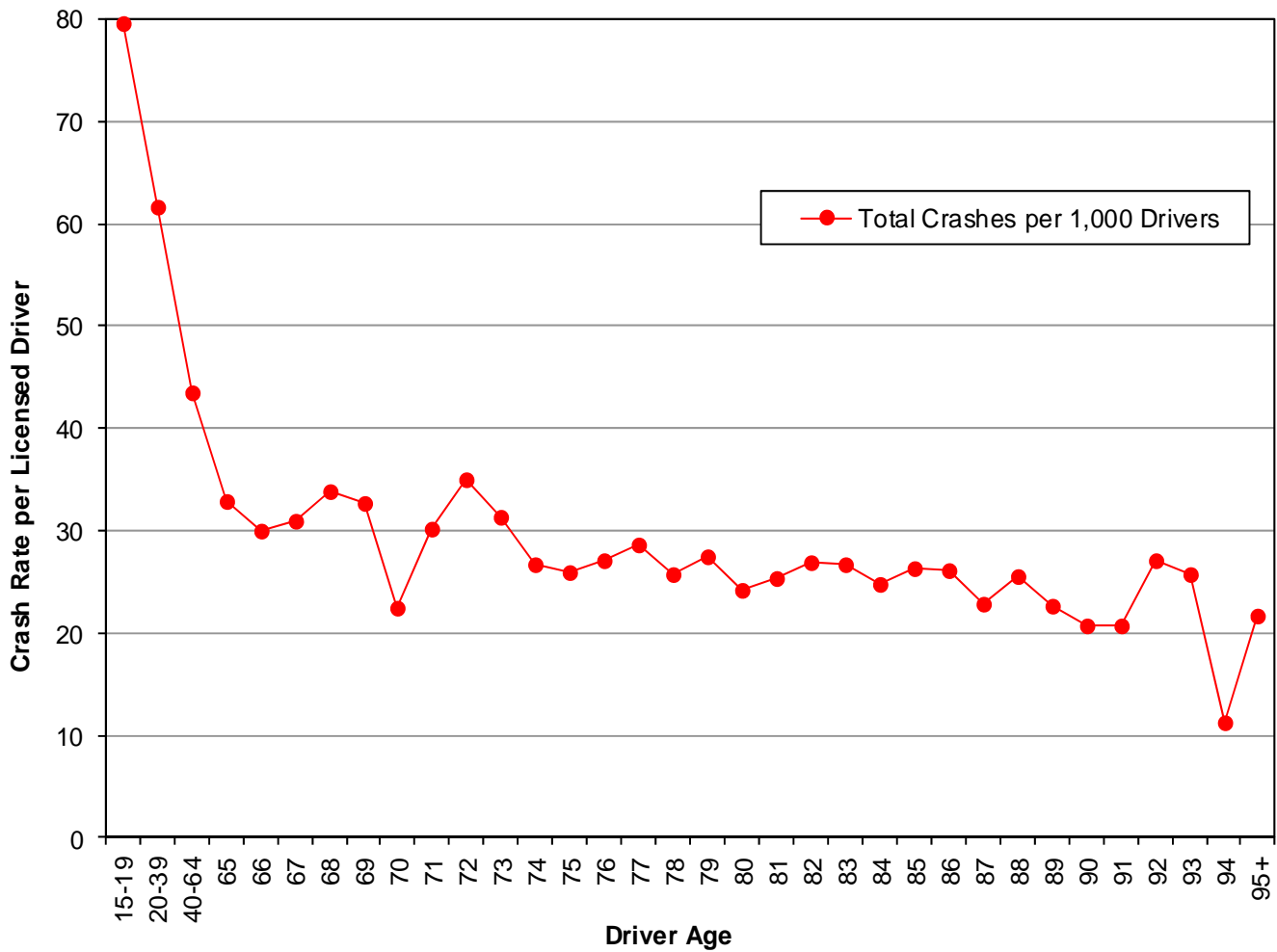
- The majority of older drivers in all motor vehicle crashes (60%) and fatal crashes (77%) were male.

Age of Older Drivers in Crashes (Utah 2016)

Older (Age 65+) Drivers												
Age	PDO Crashes			Injury Crashes			Fatal Crashes			Total		
	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers	#	%	Rate per 1,000 Drivers
65	518	9.1%	21.7	261	8.9%	11.0	4	7.7%	0.168	783	9.0%	32.9
66	441	7.8%	19.9	216	7.4%	9.8	5	9.6%	0.226	662	7.6%	29.9
67	432	7.6%	20.4	217	7.4%	10.3	6	11.5%	0.283	655	7.6%	30.9
68	466	8.2%	22.6	231	7.9%	11.2	2	3.8%	0.097	699	8.1%	33.9
69	430	7.6%	21.5	222	7.6%	11.1	3	5.8%	0.150	655	7.6%	32.7
70	306	5.4%	14.7	161	5.5%	7.7	2	3.8%	0.096	469	5.4%	22.5
71	316	5.6%	20.9	140	4.8%	9.3	1	1.9%	0.066	457	5.3%	30.2
72	327	5.8%	22.5	178	6.1%	12.3	4	7.7%	0.276	509	5.9%	35.1
73	297	5.2%	20.5	157	5.4%	10.8	1	1.9%	0.069	455	5.3%	31.4
74	257	4.5%	17.1	141	4.8%	9.4	2	3.8%	0.133	400	4.6%	26.7
75	213	3.7%	17.1	107	3.7%	8.6	3	5.8%	0.242	323	3.7%	26.0
76	194	3.4%	17.1	113	3.9%	10.0	0	0.0%	0.000	307	3.5%	27.1
77	189	3.3%	18.1	105	3.6%	10.1	5	9.6%	0.479	299	3.5%	28.7
78	167	2.9%	17.5	78	2.7%	8.2	1	1.9%	0.105	246	2.8%	25.8
79	164	2.9%	18.1	83	2.8%	9.2	1	1.9%	0.111	248	2.9%	27.4
80	134	2.4%	16.5	63	2.2%	7.8	0	0.0%	0.000	197	2.3%	24.2
81	128	2.3%	17.1	62	2.1%	8.3	1	1.9%	0.133	191	2.2%	25.5
82	125	2.2%	18.0	62	2.1%	8.9	0	0.0%	0.000	187	2.2%	26.9
83	104	1.8%	17.1	57	2.0%	9.4	1	1.9%	0.165	162	1.9%	26.7
84	82	1.4%	15.5	47	1.6%	8.9	2	3.8%	0.378	131	1.5%	24.8
85	80	1.4%	16.6	46	1.6%	9.5	1	1.9%	0.207	127	1.5%	26.3
86	77	1.4%	17.5	37	1.3%	8.4	1	1.9%	0.227	115	1.3%	26.1
87	59	1.0%	15.8	26	0.9%	7.0	0	0.0%	0.000	85	1.0%	22.8
88	44	0.8%	14.2	31	1.1%	10.0	4	7.7%	1.289	79	0.9%	25.5
89	41	0.7%	16.0	16	0.5%	6.2	1	1.9%	0.389	58	0.7%	22.6
90	18	0.3%	8.9	24	0.8%	11.8	0	0.0%	0.000	42	0.5%	20.7
91	23	0.4%	14.5	9	0.3%	5.7	1	1.9%	0.631	33	0.4%	20.8
92	22	0.4%	18.6	10	0.3%	8.4	0	0.0%	0.000	32	0.4%	27.0
93	11	0.2%	12.8	11	0.4%	12.8	0	0.0%	0.000	22	0.3%	25.7
94	5	0.1%	8.1	2	0.1%	3.2	0	0.0%	0.000	7	0.1%	11.3
95+	13	0.2%	12.2	10	0.3%	9.4	0	0.0%	0.000	23	0.3%	21.6
Total	5,683	100.0%	18.9	2,923	100.0%	9.7	52	100.0%	0.173	8,658	100.0%	28.8

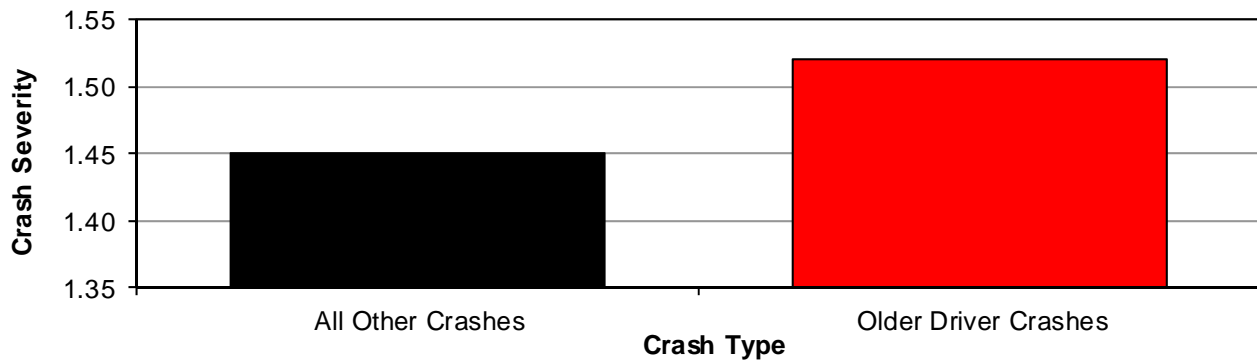
Crash Conditions

Crash Rate of Licensed Drivers by Age (Utah 2016)



- The older the driver the less likely they were to be in a crash per licensed driver.
- Older drivers had the lowest crash rate per licensed driver.

Older Driver Crash Severity (Utah 2016)



- Older driver crashes were 22% more likely to result in injury or death compared to all other crashes.

Crash Conditions

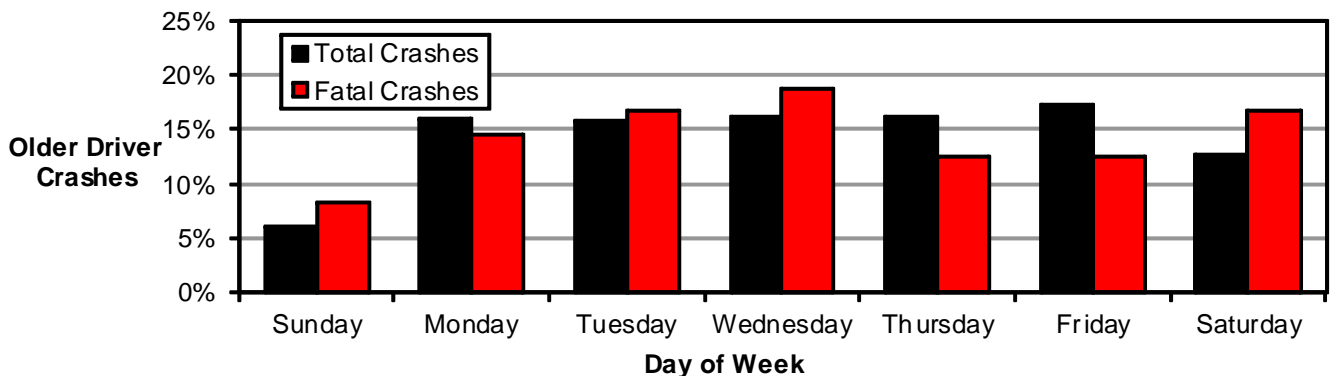
Older Driver Crashes by Month (Utah 2016)

Older (Age 65+) Driver Crashes								
Month	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	391	12.6	185	6.0	0	0.00	576	18.6
February	387	13.3	189	6.5	3	0.10	579	20.0
March	381	12.3	221	7.1	2	0.06	604	19.5
April	380	12.7	228	7.6	5	0.17	613	20.4
May	454	14.6	213	6.9	7	0.23	674	21.7
June	461	15.4	260	8.7	7	0.23	728	24.3
July	418	13.5	237	7.6	6	0.19	661	21.3
August	480	15.5	252	8.1	1	0.03	733	23.6
September	466	15.5	263	8.8	7	0.23	736	24.5
October	522	16.8	230	7.4	6	0.19	758	24.5
November	504	16.8	251	8.4	2	0.07	757	25.2
December	534	17.2	225	7.3	2	0.06	761	24.5
Total	5,378	14.7	2,754	7.5	48	0.13	8,180	22.3

- Overall, September through December had the highest rates per day for older driver crashes.
- The highest rate per day of fatal older driver crashes occurred in May, June, and September.

Older Driver Crashes by Day of Week (Utah 2016)

Older (Age 65+) Driver Crashes								
Day of Week	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Sunday	310	5.8%	176	6.4%	4	8.3%	490	6.0%
Monday	861	16.0%	447	16.2%	7	14.6%	1,315	16.1%
Tuesday	834	15.5%	446	16.2%	8	16.7%	1,288	15.7%
Wednesday	881	16.4%	435	15.8%	9	18.8%	1,325	16.2%
Thursday	902	16.8%	410	14.9%	6	12.5%	1,318	16.1%
Friday	938	17.4%	467	17.0%	6	12.5%	1,411	17.2%
Saturday	652	12.1%	373	13.5%	8	16.7%	1,033	12.6%
Total	5,378	100.0%	2,754	100.0%	48	100.0%	8,180	100.0%

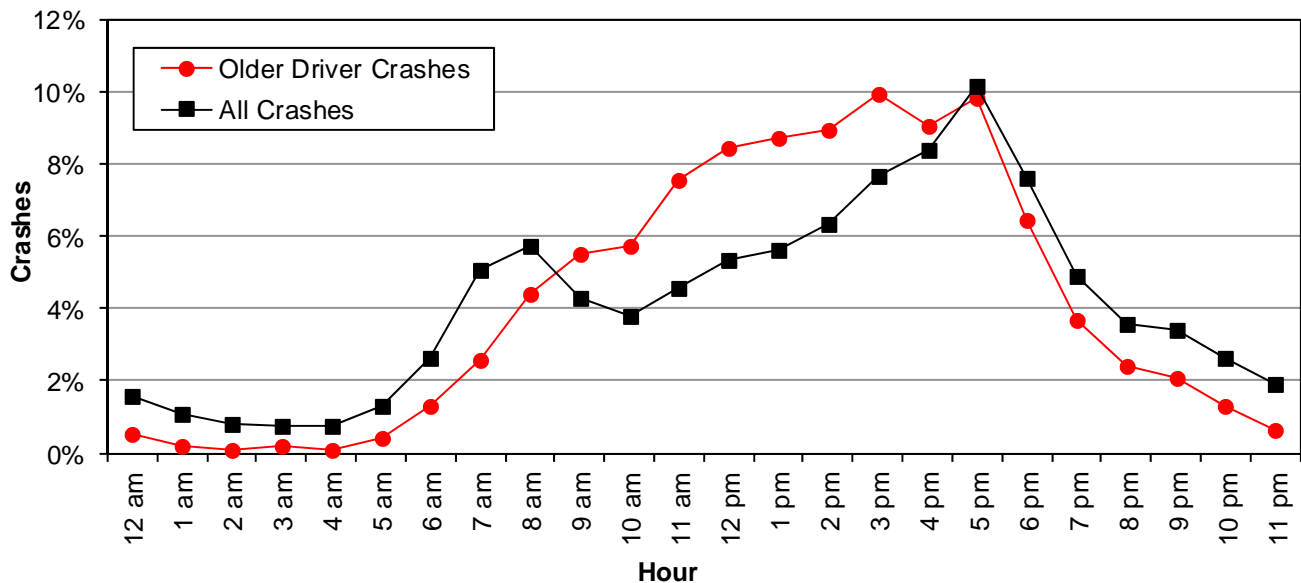


- Overall, the highest percentage of older driver crashes occurred on Friday (17%).
- The highest percentage of fatal older driver crashes occurred on Wednesday (19%).

Crash Conditions

Older Driver Crashes by Hour (Utah 2016)

Older (Age 65+) Driver Crashes								
Hour	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Midnight	26	0.5%	15	0.5%	0	0.0%	41	0.5%
1 a.m.	12	0.2%	4	0.1%	0	0.0%	16	0.2%
2 a.m.	5	0.1%	1	0.0%	0	0.0%	6	0.1%
3 a.m.	10	0.2%	3	0.1%	2	4.2%	15	0.2%
4 a.m.	5	0.1%	4	0.1%	0	0.0%	9	0.1%
5 a.m.	23	0.4%	11	0.4%	1	2.1%	35	0.4%
6 a.m.	76	1.4%	31	1.1%	0	0.0%	107	1.3%
7 a.m.	148	2.8%	61	2.2%	1	2.1%	210	2.6%
8 a.m.	223	4.1%	133	4.8%	3	6.3%	359	4.4%
9 a.m.	299	5.6%	151	5.5%	0	0.0%	450	5.5%
10 a.m.	300	5.6%	164	6.0%	3	6.3%	467	5.7%
11 a.m.	396	7.4%	219	8.0%	4	8.3%	619	7.6%
Noon	477	8.9%	208	7.6%	5	10.4%	690	8.4%
1 p.m.	467	8.7%	233	8.5%	12	25.0%	712	8.7%
2 p.m.	478	8.9%	245	8.9%	7	14.6%	730	8.9%
3 p.m.	531	9.9%	279	10.1%	3	6.3%	813	9.9%
4 p.m.	505	9.4%	234	8.5%	1	2.1%	740	9.0%
5 p.m.	491	9.1%	312	11.3%	2	4.2%	805	9.8%
6 p.m.	342	6.4%	186	6.8%	2	4.2%	530	6.5%
7 p.m.	208	3.9%	94	3.4%	0	0.0%	302	3.7%
8 p.m.	134	2.5%	60	2.2%	1	2.1%	195	2.4%
9 p.m.	111	2.1%	58	2.1%	1	2.1%	170	2.1%
10 p.m.	77	1.4%	30	1.1%	0	0.0%	107	1.3%
11 p.m.	34	0.6%	18	0.7%	0	0.0%	52	0.6%
Total	5,378	100.0%	2,754	100.0%	48	100.0%	8,180	100.0%



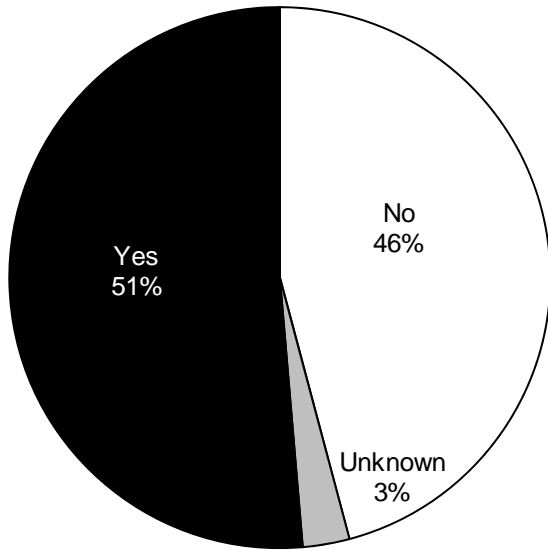
- Older driver total crashes were highest from 2:00 p.m. to 6:59 p.m.
- Compared to all crashes, older driver crashes occurred more often in the daytime (9:00 a.m.-4:59 p.m.).

Crash Conditions

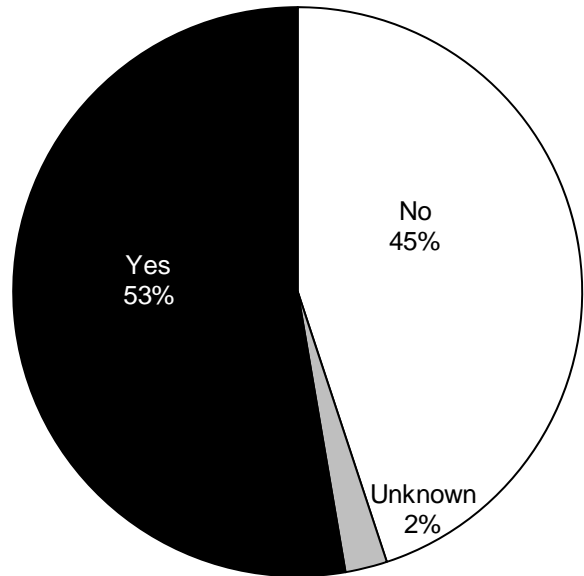
Older Drivers with Contributing Factors in Crashes (Utah 2016)

Older (Age 65+) Drivers/Vehicles								
Driver/Vehicle with a Contributing Factor(s)	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Yes	2,958	52.0%	1,571	53.7%	33	63.5%	4,562	52.7%
No	2,585	45.5%	1,286	44.0%	19	36.5%	3,890	44.9%
Unknown	140	2.5%	66	2.3%	0	0.0%	206	2.4%
Total	5,683	100.0%	2,923	100.0%	52	100.0%	8,658	100.0%

All Drivers



Older Drivers



- Some form of poor driver performance is present in the majority of crashes.
- 53% of older drivers had a contributing factor in total crashes.
- Older drivers had a contributing factor in a crash about the same as all drivers.

Crash Conditions

Contributing Factors of Older Driver Crashes (Utah 2016)

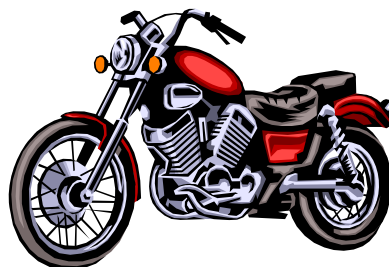
Older (Age 65+) Drivers/Vehicles								
Contributing Factors	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Failed to Yield Right of Way	851	19.9%	616	26.2%	9	14.8%	1,476	22.1%
Followed Too Closely	465	10.9%	273	11.6%	3	4.9%	741	11.1%
Failed to Keep in Proper Lane	358	8.4%	164	7.0%	1	1.6%	523	7.8%
Disregard Traffic Signal/Sign	195	4.6%	199	8.5%	2	3.3%	396	5.9%
Improper Turn	267	6.3%	107	4.6%	2	3.3%	376	5.6%
Speed Too Fast	223	5.2%	124	5.3%	10	16.4%	357	5.3%
Other Improper Driving	227	5.3%	118	5.0%	0	0.0%	345	5.2%
Driver Distraction	181	4.2%	117	5.0%	3	4.9%	301	4.5%
Improper Lane Change	249	5.8%	46	2.0%	1	1.6%	296	4.4%
Vision Obscured by Weather Condition	153	3.6%	77	3.3%	0	0.0%	230	3.4%
Improper Backing	195	4.6%	12	0.5%	0	0.0%	207	3.1%
Ran Off Road	80	1.9%	64	2.7%	14	23.0%	158	2.4%
Improper Parking/Stopping	104	2.4%	36	1.5%	0	0.0%	140	2.1%
Driver Illness/Medical	56	1.3%	66	2.8%	3	4.9%	125	1.9%
Vision Obscured by Moving Vehicle	63	1.5%	30	1.3%	0	0.0%	93	1.4%
Vision Obscured by Glare	58	1.4%	29	1.2%	0	0.0%	87	1.3%
Driver Asleep/Fatigue	52	1.2%	33	1.4%	1	1.6%	86	1.3%
Swerved or Evasive Action	51	1.2%	28	1.2%	0	0.0%	79	1.2%
Overcorrected	40	0.9%	33	1.4%	5	8.2%	78	1.2%
Vehicle Other Defective Condition	45	1.1%	21	0.9%	0	0.0%	66	1.0%
Driver Condition Other	34	0.8%	23	1.0%	0	0.0%	57	0.9%
Hit and Run	49	1.1%	8	0.3%	0	0.0%	57	0.9%
Driving Under the Influence	27	0.6%	25	1.1%	0	0.0%	52	0.8%
Vision Obscured by Parked Vehicle	37	0.9%	13	0.6%	0	0.0%	50	0.7%
Vision Obscured by Other	33	0.8%	16	0.7%	0	0.0%	49	0.7%
Improper Passing	31	0.7%	5	0.2%	1	1.6%	37	0.6%
Wrong Side/Wrong Way	26	0.6%	11	0.5%	0	0.0%	37	0.6%
Vehicle Brakes	16	0.4%	11	0.5%	1	1.6%	28	0.4%
Disregard Road Markings	15	0.4%	10	0.4%	0	0.0%	25	0.4%
Vehicle Cargo/Trailer Hitch	20	0.5%	4	0.2%	0	0.0%	24	0.4%
Vehicle Tires	15	0.4%	7	0.3%	2	3.3%	24	0.4%
Driver Emotional Prior to Crash	13	0.3%	4	0.2%	0	0.0%	17	0.3%
Reckless/Aggressive Driving	9	0.2%	8	0.3%	0	0.0%	17	0.3%
Vision Obscured by Vegetation	10	0.2%	4	0.2%	3	4.9%	17	0.3%
Vision Obscured by Building, Sign, etc.	7	0.2%	5	0.2%	0	0.0%	12	0.2%
Windshield or Other Window Obscured	9	0.2%	3	0.1%	0	0.0%	12	0.2%
Improper Signal	5	0.1%	1	0.0%	0	0.0%	6	0.1%
Total	4,269	100.0%	2,351	100.0%	61	100.0%	6,681	100.0%

- Some form of poor driver performance is present in the majority of crashes. The leading contributing factors for all older driver crashes were failed to yield right of way (22%), followed too closely (11%), and failed to keep in proper lane (8%).
- The leading contributing factors in fatal older driver crashes were ran off road (23%) and speed too fast (16%).
- Compared to drivers of all ages, older drivers were more likely to have a contributing factor of failure to yield right of way, improper turn, disregard traffic signal/sign, improper lane change, and improper backing.

Motorcycles



DRIVE AWARE. RIDE AWARE.



Section 10: Motorcycles

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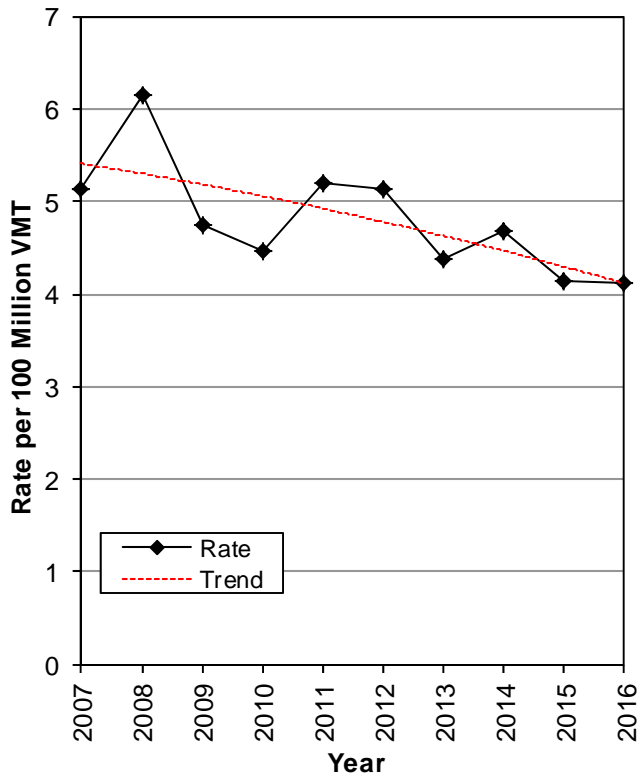
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Trends

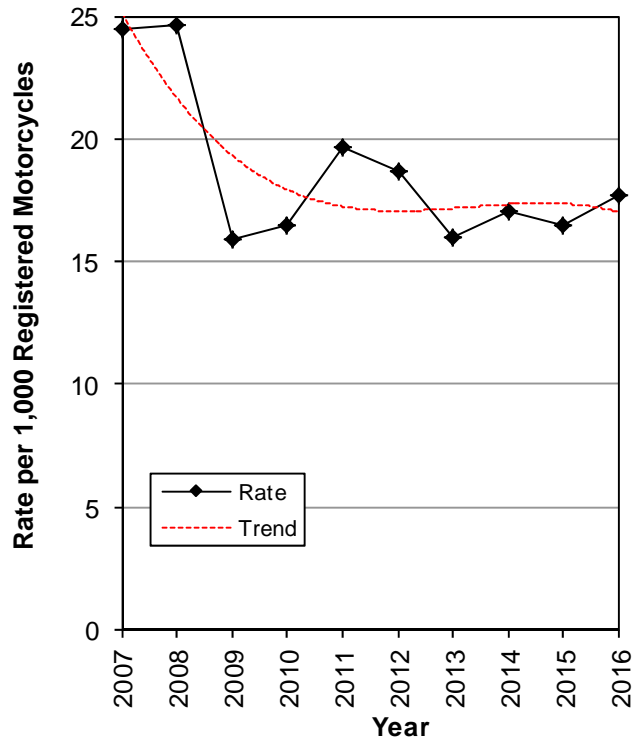
Motorcyclists in Crashes (Utah 2007-2016)

Year	Motorcyclists (Driver and Passenger)											
	Non-Injured			Injured			Killed			Total		
	#	Rate per 100 Million VMT	Rate per 1,000 Rgstrd Mtrcycls	#	Rate per 100 Million VMT	Rate per 1,000 Rgstrd Mtrcycls	#	Rate per 100 Million VMT	Rate per 1,000 Rgstrd Mtrcycls	#	Rate per 100 Million VMT	Rate per 1,000 Registered Motorcycles
2007	269	1.0	4.8	1,076	4.0	19.2	33	0.12	0.59	1,378	5.14	24.5
2008	255	1.0	4.0	1,301	5.0	20.2	36	0.14	0.56	1,592	6.15	24.7
2009	232	0.9	3.0	980	3.7	12.5	30	0.11	0.38	1,242	4.74	15.9
2010	190	0.7	2.6	979	3.7	13.6	21	0.08	0.29	1,190	4.47	16.5
2011	228	0.9	3.3	1,117	4.2	16.0	28	0.11	0.40	1,373	5.20	19.7
2012	225	0.8	3.1	1,111	4.2	15.2	32	0.12	0.44	1,368	5.14	18.7
2013	204	0.8	2.7	951	3.5	12.8	31	0.11	0.42	1,186	4.39	16.0
2014	206	0.7	2.7	1,043	3.8	13.8	45	0.16	0.60	1,294	4.69	17.1
2015	202	0.7	2.7	979	3.3	13.3	36	0.12	0.49	1,217	4.14	16.5
2016	215	0.7	3.0	1,014	3.3	14.1	41	0.13	0.57	1,270	4.13	17.7
Total	2,226	0.8	3.1	10,551	3.9	14.9	333	0.12	0.47	13,110	4.80	18.5

Motorcyclist Crash Rates per VMT (Utah 2007-2016)



Motorcyclist Crash Rates per Registered Motorcycles (Utah 2007-2016)



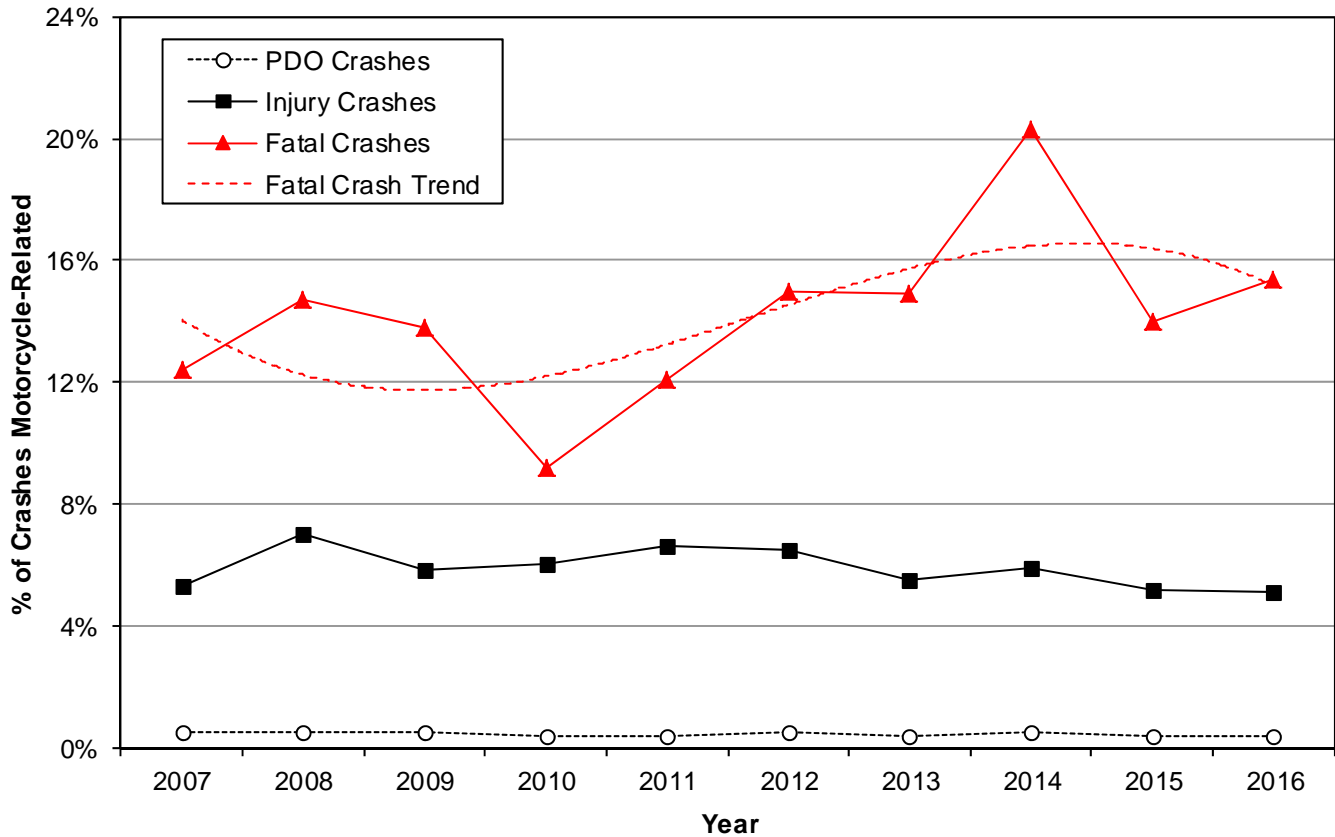
- 2016 had the lowest (4.13) rate of total motorcyclists in crashes per 100 million VMT.
- 2008 had the highest (6.15) rate of total motorcyclists in crashes per 100 million VMT.
- The rate of motorcyclists in crashes per registered motorcycle decreased 28% from 2007 to 2016.
- 2008 had the highest (24.7) rate of total motorcyclists in crashes per registered motorcycle.

Trends

Motorcycle Crashes (Utah 2007-2016)

Year	Property Damage Only			Injury			Fatal			Total		
	All	Motorcycle	%	All	Motorcycle	%	All	Motorcycle	%	All	Motorcycle	%
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	199	0.5%	18,619	984	5.3%	258	32	12.4%	61,245	1,215	2.0%
2008	38,997	177	0.5%	17,125	1,192	7.0%	245	36	14.7%	56,367	1,405	2.5%
2009	35,398	182	0.5%	15,752	914	5.8%	217	30	13.8%	51,367	1,126	2.2%
2010	34,155	137	0.4%	14,995	892	5.9%	218	20	9.2%	49,368	1,049	2.1%
2011	36,418	161	0.4%	15,645	1,038	6.6%	224	27	12.1%	52,287	1,226	2.3%
2012	34,635	175	0.5%	15,765	1,024	6.5%	200	30	15.0%	50,600	1,229	2.4%
2013	39,301	145	0.4%	16,134	894	5.5%	202	30	14.9%	55,637	1,069	1.9%
2014	37,388	172	0.5%	16,426	962	5.9%	222	45	20.3%	54,036	1,179	2.2%
2015	42,089	167	0.4%	17,665	913	5.2%	258	36	14.0%	60,012	1,116	1.9%
2016	43,465	173	0.4%	18,747	955	5.1%	259	40	15.4%	62,471	1,168	1.9%
Total	384,214	1,688	0.4%	166,873	9,768	5.9%	2,303	326	14.2%	553,390	11,782	2.1%

Percent of Crashes Involving a Motorcycle (Utah 2007-2016)

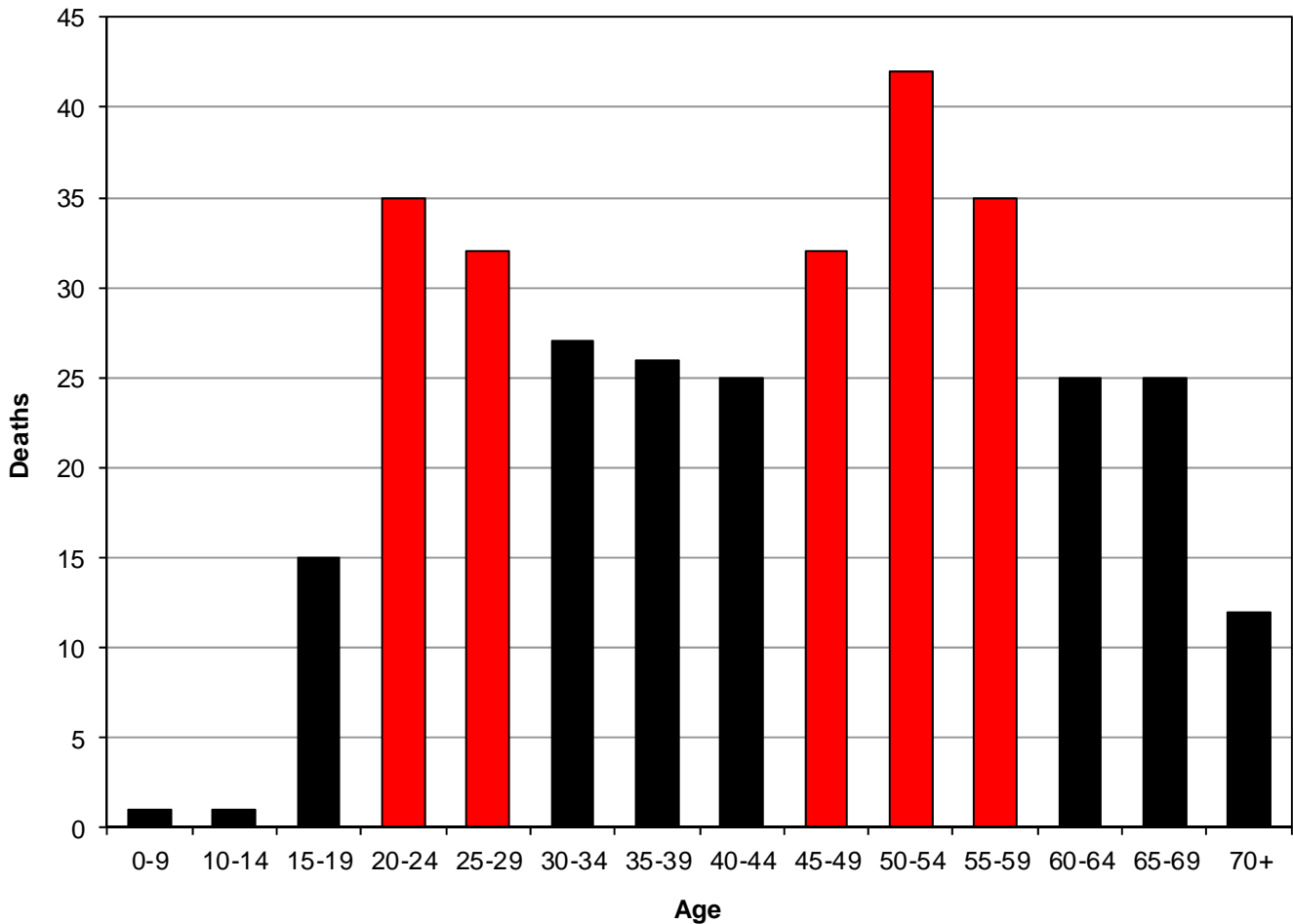


- The 10-year trend shows that motorcycle crashes represent 0.4% of property damage only crashes, 5.9% of injury crashes, and 14.2% of fatal crashes.
- Motorcycles are over-represented in fatal crashes and injury crashes accounting for 14.2% of fatal crashes and 5.9% of injury crashes compared to 2.1% of total crashes.
- During the last 10 years, the highest percent of total crashes involving motorcycles occurred in 2008 (2.5%).

Trends

Motorcyclists Killed by Age (Utah 2007-2016)

Motorcyclists Killed												
Age	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
0-9	0	0	0	0	0	1	0	0	0	0	1	0.3%
10-14	0	1	0	0	0	0	0	0	0	0	1	0.3%
15-19	4	1	1	0	0	1	1	2	3	2	15	4.5%
20-24	7	6	0	2	1	6	1	4	4	4	35	10.5%
25-29	1	7	3	3	3	2	3	4	3	3	32	9.6%
30-34	1	3	2	4	4	3	1	2	2	5	27	8.1%
35-39	0	5	1	1	2	2	3	5	4	3	26	7.8%
40-44	2	2	2	1	1	2	8	1	2	4	25	7.5%
45-49	4	3	6	1	4	2	3	4	3	2	32	9.6%
50-54	4	5	5	1	3	2	2	10	7	3	42	12.6%
55-59	2	0	4	5	5	6	3	2	3	5	35	10.5%
60-64	2	2	4	0	4	4	2	5	1	1	25	7.5%
65-69	5	1	1	3	0	1	2	2	3	7	25	7.5%
70+	1	0	1	0	1	0	2	4	1	2	12	3.6%
Total	33	36	30	21	28	32	31	45	36	41	333	100.0%

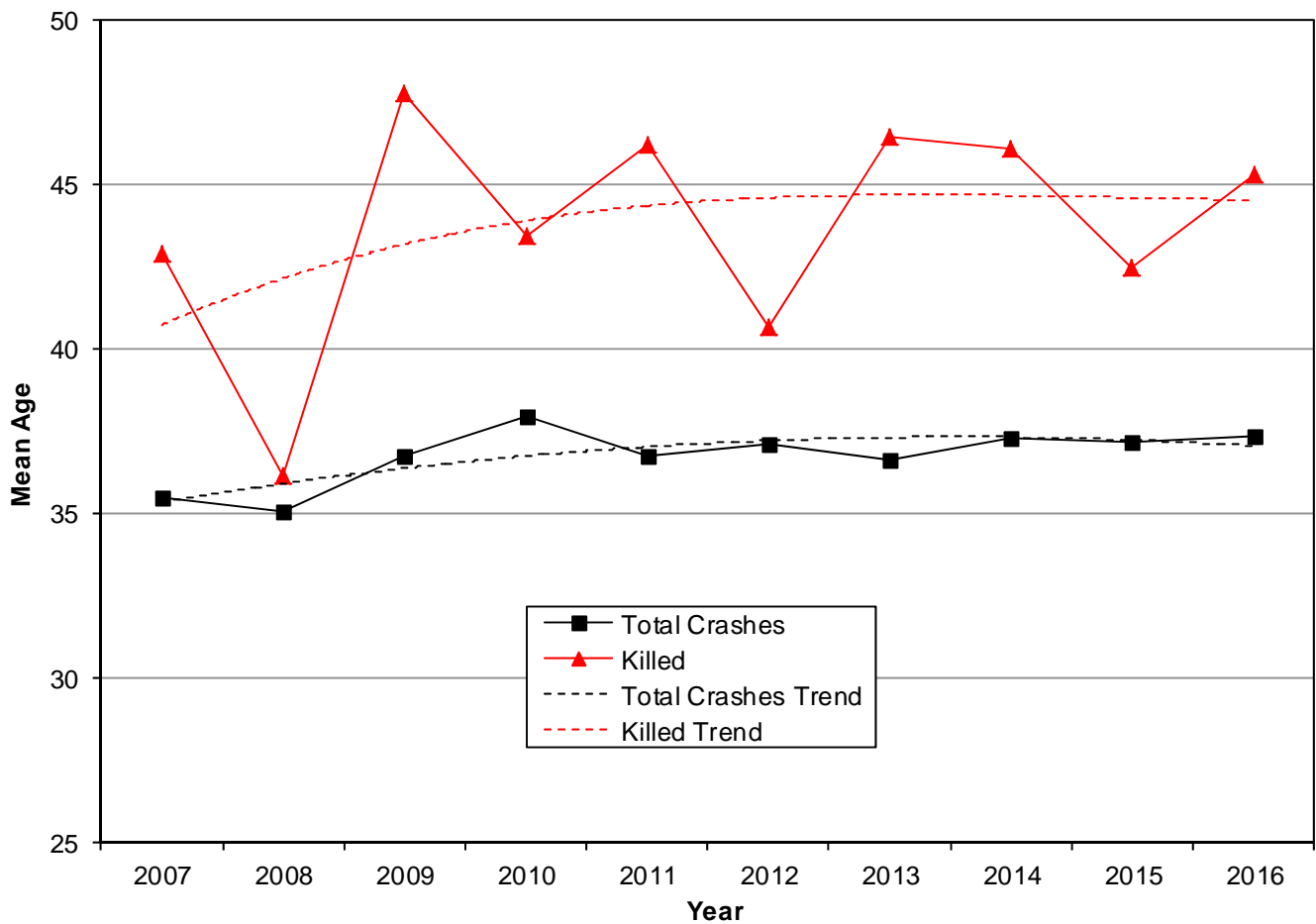


- The 10-year totals show that motorcyclist deaths were highest among the 45-59 and 20-29 year age groups.

Trends

Motorcyclists in Crashes by Age (Utah 2007-2016)

Motorcyclists (Driver and Passenger)		
Year	Total	Killed
	Mean Age	Mean Age
2007	35.45	42.88
2008	35.02	36.14
2009	36.72	47.80
2010	37.97	43.43
2011	36.73	46.18
2012	37.11	40.63
2013	36.64	46.45
2014	37.29	46.11
2015	37.17	42.47
2016	37.33	45.32
Average	36.74	43.74

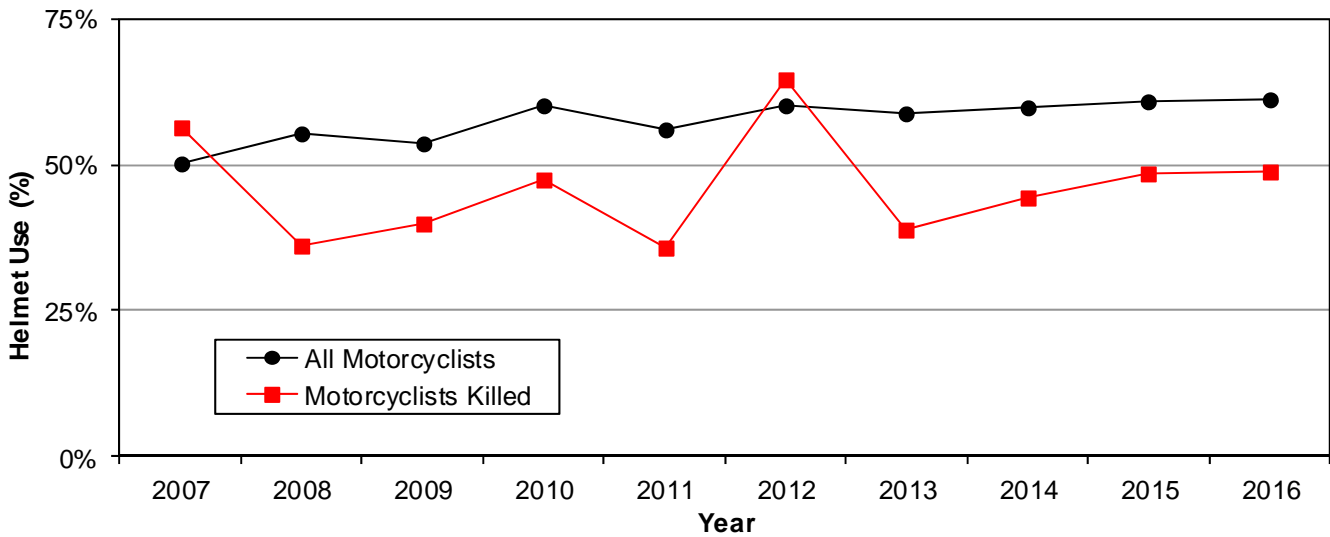


- The 10-year trend shows that the age of motorcyclists in crashes is steadily increasing. Increasing from 35.45 in 2006 to 37.33 in 2016.
- The 10-year trend shows that the age of motorcyclists killed in crashes is steadily increasing. Increasing from 42.88 in 2007 to 45.32 in 2016.

Helmets

Helmet Use of Motorcyclists in Crashes (Utah 2007-2016)

Motorcyclists (Driver and Passenger)												
Year	Non-Injured			Injured			Killed			Total		
	No Hlmt	Helmet	%	No Hlmt	Helmet	%	No Hlmt	Helmet	%	No Helmet	Helmet	%
	#	#	%	#	#	%	#	#	%	#	#	%
2007	70	90	56.3%	513	497	49.2%	14	18	56.3%	597	605	50.3%
2008	56	156	73.6%	569	629	52.5%	23	13	36.1%	648	798	55.2%
2009	51	95	65.1%	436	476	52.2%	18	12	40.0%	505	583	53.6%
2010	48	84	63.6%	359	534	59.8%	11	10	47.6%	418	628	60.0%
2011	78	91	53.8%	444	586	56.9%	18	10	35.7%	540	687	56.0%
2012	57	113	66.5%	417	597	58.9%	11	20	64.5%	485	730	60.1%
2013	49	92	65.2%	350	491	58.4%	19	12	38.7%	418	595	58.7%
2014	54	111	67.3%	411	596	59.2%	25	20	44.4%	490	727	59.7%
2015	70	88	55.7%	360	587	62.0%	17	16	48.5%	447	691	60.7%
2016	64	111	63.4%	382	600	61.1%	20	19	48.7%	466	730	61.0%
Total	597	1,031	63.3%	4,241	5,593	56.9%	176	150	46.0%	5,014	6,774	57.5%



- Overall helmet use by motorcyclists in crashes increased from 54.5% in 2006 to 60.7% in 2015.
- Helmet use among motorcyclists killed has shown an increasing trend.

Helmet Use of Motorcyclists in Crashes (Utah 2016)

Motorcyclists (Driver and Passenger)								
Helmet Use	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Helmet Worn	111	51.6%	600	59.2%	19	46.3%	730	57.5%
Helmet Not Worn	64	29.8%	382	37.7%	20	48.8%	466	36.7%
Unknown	40	18.6%	32	3.2%	2	4.9%	74	5.8%
Total	215	100.0%	1,014	100.0%	41	100.0%	1,270	100.0%



- Only 61% (of known) of the motorcyclists in crashes wore a helmet.
- Only 19 of the 41 motorcyclists killed in crashes (46%) were wearing a helmet.

Motorcycle Crash Conditions

Motorcyclists in Crashes by County (Utah 2016)

Motorcyclists (Driver and Passenger)												
County	Non-Injured			Injured			Killed			Total		
	#	Rate per 100 Million VMT	Rate per 1,000 Rgstrd Mtrcycl	#	Rate per 100 Million VMT	Rate per 1,000 Rgstrd Mtrcycl	#	Rate per 100 Million VMT	Rate per 1,000 Rgstrd Mtrcycl	#	Rate per 100 Million VMT	Rate per 1,000 Rgstrd Mtrcycl
Rich	2	3.6	34.5	10	18.2	172.4	0	0.00	0.00	12	21.8	206.9
Piute	1	3.1	34.5	4	12.3	137.9	0	0.00	0.00	5	15.3	172.4
Garfield	2	1.5	18.2	12	9.2	109.1	0	0.00	0.00	14	10.8	127.3
Wayne	0	0.0	0.0	10	18.3	109.9	0	0.00	0.00	10	18.3	109.9
Daggett	1	2.9	38.5	0	0.0	0.0	1	2.88	38.46	2	5.8	76.9
Beaver	0	0.0	0.0	6	2.0	57.7	0	0.00	0.00	6	2.0	57.7
San Juan	0	0.0	0.0	9	2.7	39.6	1	0.30	4.41	10	3.0	44.1
Grand	3	0.7	5.8	10	2.5	19.4	0	0.00	0.00	13	3.2	25.2
Iron	7	0.8	6.8	16	1.9	15.5	2	0.24	1.94	25	3.0	24.2
Wasatch	3	0.7	3.4	15	3.7	16.8	2	0.50	2.23	20	5.0	22.3
Washington	12	0.7	2.5	91	5.5	18.9	3	0.18	0.62	106	6.4	22.0
Morgan	1	0.7	3.1	5	3.4	15.6	1	0.67	3.12	7	4.7	21.8
Emery	0	0.0	0.0	3	0.8	15.9	1	0.26	5.29	4	1.0	21.2
Salt Lake	102	1.0	4.0	381	3.9	15.1	14	0.14	0.56	497	5.0	19.7
Uintah	6	1.4	5.6	13	3.0	12.1	0	0.00	0.00	19	4.3	17.7
Weber	16	0.9	2.5	91	5.1	14.2	3	0.17	0.47	110	6.1	17.2
Box Elder	2	0.2	1.4	22	2.2	15.3	0	0.00	0.00	24	2.4	16.7
Millard	1	0.2	4.1	3	0.5	12.4	0	0.00	0.00	4	0.7	16.5
Cache	11	1.1	3.6	33	3.3	10.9	3	0.30	0.99	47	4.7	15.6
Tooele	5	0.6	2.9	20	2.2	11.6	1	0.11	0.58	26	2.9	15.1
Utah	19	0.4	1.6	149	3.2	12.7	1	0.02	0.09	169	3.6	14.4
Kane	1	0.6	4.7	2	1.2	9.3	0	0.00	0.00	3	1.8	14.0
Summit	4	0.5	2.5	17	2.0	10.6	0	0.00	0.00	21	2.5	13.1
Juab	1	0.2	4.3	2	0.4	8.5	0	0.00	0.00	3	0.7	12.8
Sevier	1	0.3	2.4	3	0.8	7.1	1	0.27	2.37	5	1.4	11.8
Davis	12	0.4	1.4	74	2.5	8.8	7	0.24	0.83	93	3.1	11.1
Sanpete	1	0.4	2.2	4	1.6	8.7	0	0.00	0.00	5	2.0	10.9
Carbon	1	0.3	1.6	5	1.4	7.9	0	0.00	0.00	6	1.7	9.4
Duchesne	0	0.0	0.0	4	1.2	7.6	0	0.00	0.00	4	1.2	7.6
Statewide	215	0.7	3.0	1,014	3.3	14.1	41	0.13	0.57	1,270	4.1	17.7

- Rich, Piute, and Garfield counties had the highest rates of motorcyclists in crashes per registered motorcycle and Rich, Wayne, and Piute counties had the highest rates of motorcyclists in crashes per VMT.

Occupant Placement of Motorcyclists in Crashes (Utah 2016)

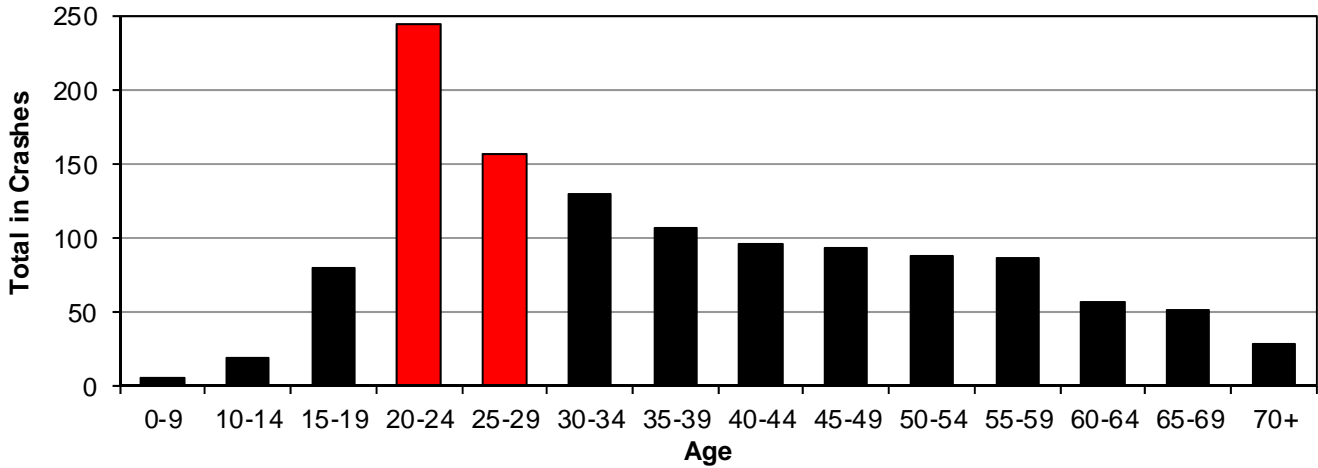
- Drivers accounted for the majority of motorcyclists in a crash (92%) and motorcyclists killed (95%).

Motorcyclists (Driver and Passenger)									
Occupant Placement	Non-Injured		Injured		Killed		Total		
	#	%	#	%	#	%	#	%	
Driver	200	93.0%	935	92.2%	39	95.1%	1,174	92.4%	
Passenger	15	7.0%	79	7.8%	2	4.9%	96	7.6%	
Total	215	100.0%	1,014	100.0%	41	100.0%	1,270	100.0%	

Motorcycle Crash Conditions

Age of Motorcyclists in Crashes (Utah 2016)

Motorcyclists (Driver and Passenger)								
Age	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
0-9	1	0.5%	4	45.0%	0	0.0%	5	0.4%
10-14	2	0.9%	16	1.6%	0	0.0%	18	1.4%
15-19	12	5.6%	65	6.4%	2	4.9%	79	6.2%
20-24	43	20.0%	197	19.4%	4	9.8%	244	19.2%
25-29	30	14.0%	124	12.2%	3	7.3%	157	12.4%
30-34	15	7.0%	110	10.8%	5	12.2%	130	10.2%
35-39	14	6.5%	89	8.8%	3	7.3%	106	8.3%
40-44	18	8.4%	74	7.3%	4	9.8%	96	7.6%
45-49	17	7.9%	74	7.3%	2	4.9%	93	7.3%
50-54	9	4.2%	76	7.5%	3	7.3%	88	6.9%
55-59	13	6.0%	68	6.7%	5	12.2%	86	6.8%
60-64	12	5.6%	44	4.3%	1	2.4%	57	4.5%
65-69	7	3.3%	37	3.6%	7	17.1%	51	4.0%
70+	7	3.3%	19	1.9%	2	4.9%	28	2.2%
Unknown	15	7.0%	17	1.7%	0	0.0%	32	2.5%
Total	215	100.0%	1,014	144.6%	41	100.0%	1,270	100.0%



- Overall, the largest percentages of motorcyclists in crashes were aged 20-29 years (32%).
- The highest number of motorcyclist deaths were aged 65-69 years.

Gender of Motorcyclists in Crashes (Utah 2016)

Motorcyclists (Driver and Passenger)								
Gender	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Male	179	83.3%	881	86.9%	38	92.7%	1,098	86.5%
Female	24	11.2%	130	12.8%	3	7.3%	157	12.4%
Unknown	12	5.6%	3	0.3%	0	0.0%	15	1.2%
Total	215	100.0%	1,014	100.0%	41	100.0%	1,270	100.0%

- The majority of all motorcyclists (87%) and motorcyclists killed (93%) in crashes were male.

Motorcycle Crash Conditions

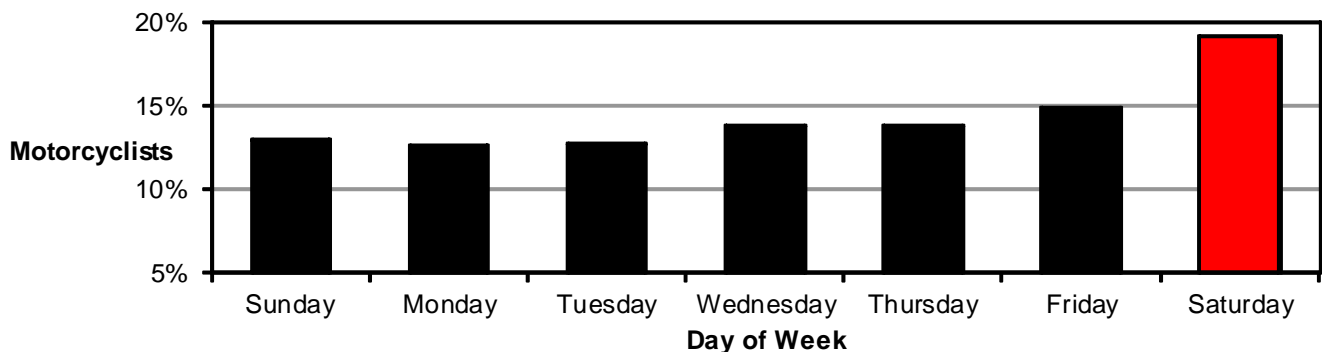
Motorcyclists in Crashes by Month (Utah 2016)

Motorcyclists (Driver and Passenger)								
Month	Non-Injured		Injured		Killed		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	4	0.1	14	0.5	0	0.00	18	0.6
February	5	0.2	30	1.0	0	0.00	35	1.2
March	8	0.3	37	1.2	2	0.06	47	1.5
April	25	0.8	97	3.2	4	0.13	126	4.2
May	24	0.8	108	3.5	5	0.16	137	4.4
June	27	0.9	144	4.8	4	0.13	175	5.8
July	38	1.2	147	4.7	5	0.16	190	6.1
August	22	0.7	149	4.8	6	0.19	177	5.7
September	29	1.0	134	4.5	7	0.23	170	5.7
October	24	0.8	94	3.0	5	0.16	123	4.0
November	5	0.2	47	1.6	3	0.10	55	1.8
December	4	0.1	13	0.4	0	0.00	17	0.5
Total	215	0.6	1,014	2.8	41	0.11	1,270	3.5

- June through September had the highest rates per day of total motorcycle crashes.
- September and August had the highest totals of motorcyclists killed.

Motorcyclists in Crashes by Day of Week (Utah 2016)

Motorcyclists (Driver and Passenger)								
Day of Week	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Sunday	19	8.8%	139	13.7%	7	17.1%	165	13.0%
Monday	27	12.6%	128	12.6%	5	12.2%	160	12.6%
Tuesday	24	11.2%	133	13.1%	5	12.2%	162	12.8%
Wednesday	36	16.7%	134	13.2%	5	12.2%	175	13.8%
Thursday	31	14.4%	137	13.5%	7	17.1%	175	13.8%
Friday	34	15.8%	150	14.8%	5	12.2%	189	14.9%
Saturday	44	20.5%	193	19.0%	7	17.1%	244	19.2%
Total	215	100.0%	1,014	100.0%	41	100.0%	1,270	100.0%

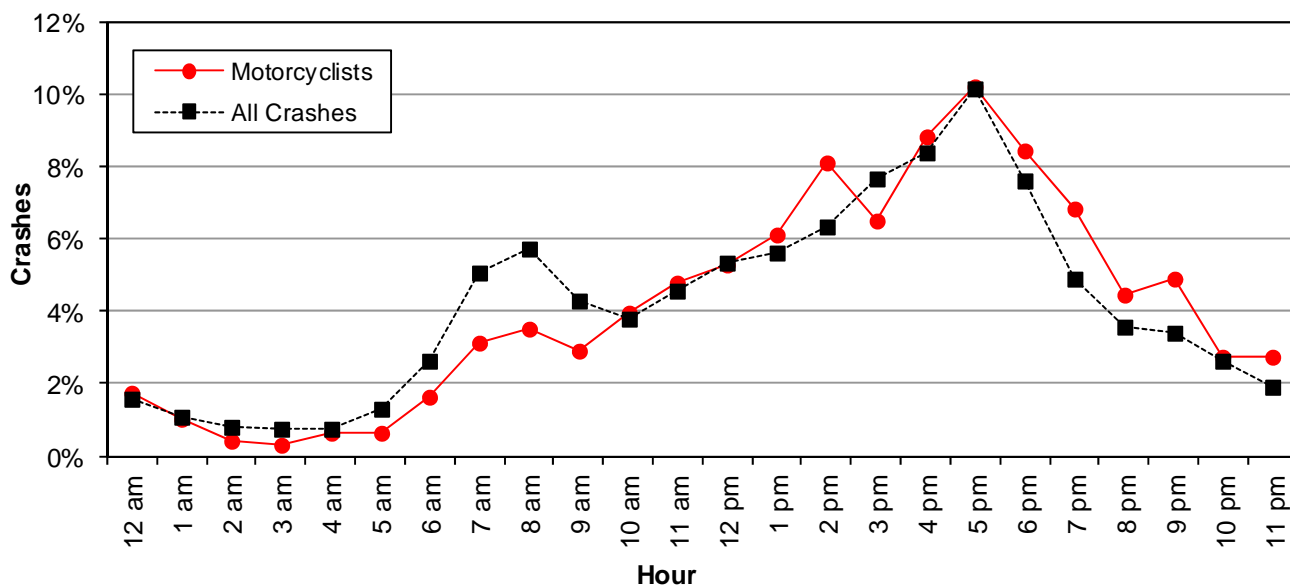


- Saturday had the highest number of motorcyclists in total crashes.
- Fatal motorcycle crashes occurred most frequently on Sunday, Thursday, and Saturday.

Motorcycle Crash Conditions

Motorcyclists in Crashes by Hour (Utah 2016)

Motorcyclists (Driver and Passenger)								
Hour	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Midnight	4	1.9%	17	1.7%	1	2.4%	22	1.7%
1 a.m.	1	0.5%	12	1.2%	0	0.0%	13	1.0%
2 a.m.	0	0.0%	3	0.3%	2	4.9%	5	0.4%
3 a.m.	0	0.0%	3	0.3%	1	2.4%	4	0.3%
4 a.m.	0	0.0%	7	0.7%	1	2.4%	8	0.6%
5 a.m.	2	0.9%	6	0.6%	0	0.0%	8	0.6%
6 a.m.	6	2.8%	14	1.4%	1	2.4%	21	1.7%
7 a.m.	8	3.7%	31	3.1%	1	2.4%	40	3.1%
8 a.m.	7	3.3%	37	3.6%	1	2.4%	45	3.5%
9 a.m.	11	5.1%	26	2.6%	0	0.0%	37	2.9%
10 a.m.	8	3.7%	41	4.0%	1	2.4%	50	3.9%
11 a.m.	12	5.6%	48	4.7%	1	2.4%	61	4.8%
Noon	14	6.5%	51	5.0%	2	4.9%	67	5.3%
1 p.m.	12	5.6%	61	6.0%	5	12.2%	78	6.1%
2 p.m.	16	7.4%	83	8.2%	4	9.8%	103	8.1%
3 p.m.	13	6.0%	66	6.5%	4	9.8%	83	6.5%
4 p.m.	15	7.0%	93	9.2%	4	9.8%	112	8.8%
5 p.m.	15	7.0%	113	11.1%	2	4.9%	130	10.2%
6 p.m.	23	10.7%	82	8.1%	2	4.9%	107	8.4%
7 p.m.	14	6.5%	72	7.1%	1	2.4%	87	6.9%
8 p.m.	11	5.1%	45	4.4%	1	2.4%	57	4.5%
9 p.m.	9	4.2%	49	4.8%	4	9.8%	62	4.9%
10 p.m.	5	2.3%	30	3.0%	0	0.0%	35	2.8%
11 p.m.	9	4.2%	24	2.4%	2	4.9%	35	2.8%
Total	215	100.0%	1,014	100.0%	41	100.0%	1,270	100.0%



- Over one-half (55%) of total motorcycle crashes occurred between 1:00 p.m. and 7:59 p.m.
- Motorcycle crashes were more likely to occur in the afternoon and evening than other crashes.

Motorcycle Crash Conditions

Motorcycle Driver Age (Utah 2016)

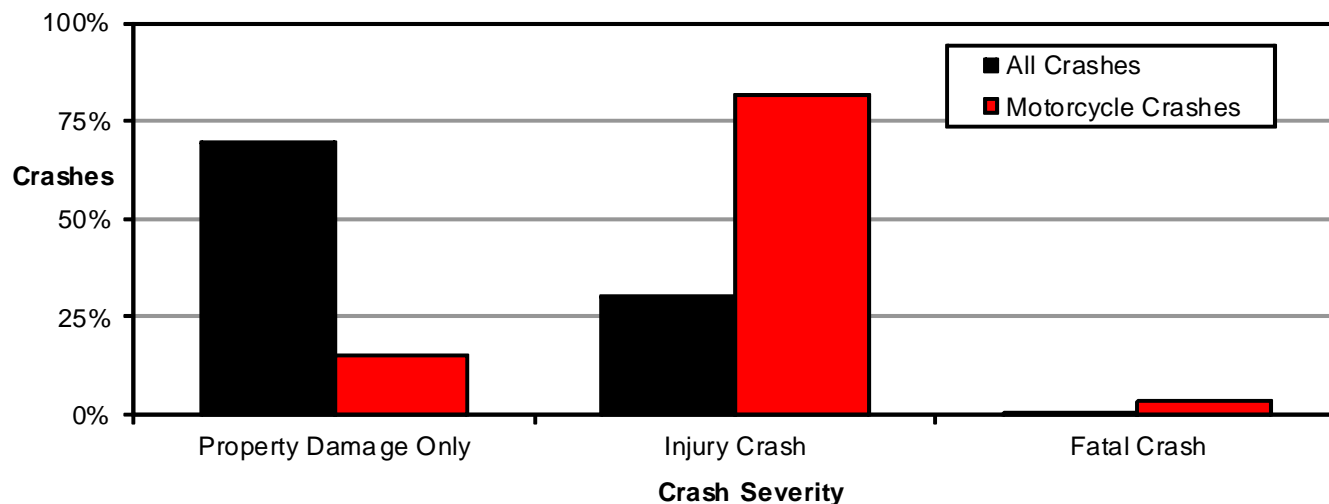
Motorcycle Drivers								
Age	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
<15	1	0.6%	15	1.5%	1	2.4%	17	1.4%
15-19	8	4.9%	61	6.3%	2	4.9%	71	6.0%
20-24	39	23.8%	193	19.9%	4	9.8%	236	20.1%
25-29	22	13.4%	116	12.0%	3	7.3%	141	12.0%
30-34	10	6.1%	103	10.6%	5	12.2%	118	10.1%
35-39	10	6.1%	87	9.0%	3	7.3%	100	8.5%
40-44	13	7.9%	73	7.5%	3	7.3%	89	7.6%
45-49	13	7.9%	70	7.2%	2	4.9%	85	7.2%
50-54	6	3.7%	74	7.6%	3	7.3%	83	7.1%
55-59	10	6.1%	62	6.4%	5	12.2%	77	6.6%
60-64	9	5.5%	43	4.4%	1	2.4%	53	4.5%
65-69	5	3.0%	35	3.6%	7	17.1%	47	4.0%
70+	4	2.4%	21	2.2%	2	4.9%	27	2.3%
Unknown	14	8.5%	16	1.7%	0	0.0%	30	2.6%
Total	164	100.0%	969	100.0%	41	100.0%	1,174	100.0%

- One-half (50%) of the motorcycle drivers in crashes were under the age of 35 years.
- The 65-69 year age group had the highest number of drivers in fatal crashes.

Motorcycle Driver License Status (Utah 2016)

- Of the 41 motorcycle drivers in fatal crashes, 34 (83%) had a valid motorcycle license.

Motorcycle Crash Severity (Utah 2016)

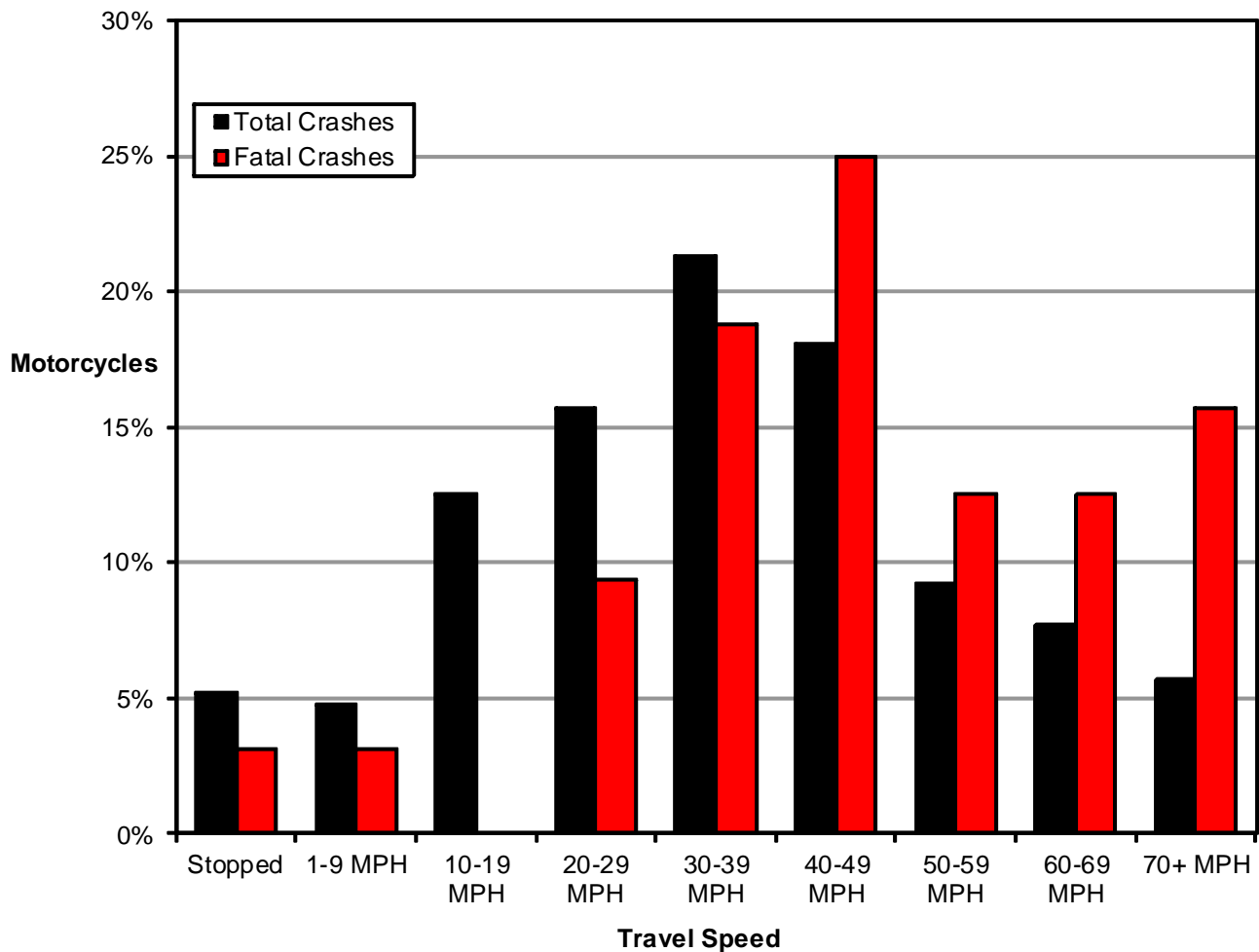


- Motorcycle crashes were more likely to result in injury (82% to 30%) or death (3.4% to 0.4%) compared to all motor vehicle crashes.

Motorcycle Crash Conditions

Travel Speed (Utah 2016)

Motorcycles								
Travel Speed	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Parked	14	8.0%	3	0.3%	0	0.0%	17	1.4%
Stopped	21	12.0%	25	2.6%	1	2.4%	47	4.0%
1-9 MPH	16	9.1%	26	2.7%	1	2.4%	43	3.6%
10-19 MPH	17	9.7%	97	10.0%	0	0.0%	114	9.6%
20-29 MPH	20	11.4%	120	12.3%	3	7.3%	143	12.0%
30-39 MPH	19	10.9%	169	17.4%	6	14.6%	194	16.3%
40-49 MPH	15	8.6%	142	14.6%	8	19.5%	165	13.9%
50-59 MPH	6	3.4%	74	7.6%	4	9.8%	84	7.1%
60-69 MPH	9	5.1%	57	5.9%	4	9.8%	70	5.9%
70-79 MPH	3	1.7%	31	3.2%	3	7.3%	37	3.1%
80+ MPH	0	0.0%	13	1.3%	2	4.9%	15	1.3%
Unknown	35	20.0%	215	22.1%	9	22.0%	259	21.8%
Total	175	100.0%	972	100.0%	41	100.0%	1,188	100.0%



- Over one-half (55% of known) of motorcycles in total crashes were traveling 20-49 MPH.
- The majority (66% of known) of the motorcycles in fatal crashes were traveling 40 MPH or higher.

Motorcycle Crash Conditions

Maneuver of Other Vehicle Prior to Motorcycle Crash (Utah 2016)

Vehicles Other than Motorcycles (Motorcycle Crash)								
Vehicle Maneuver	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Straight Ahead	59	38.3%	174	30.9%	8	32.0%	241	32.5%
Turning Left	16	10.4%	172	30.6%	15	60.0%	203	27.4%
Stopped in Traffic Lane	26	16.9%	66	11.7%	2	8.0%	94	12.7%
Changing Lanes	4	2.6%	30	5.3%	0	0.0%	34	4.6%
Slowing in Traffic Lane	10	6.5%	23	4.1%	0	0.0%	33	4.4%
Turning Right	8	5.2%	25	4.4%	0	0.0%	33	4.4%
Parked/Parking	11	7.1%	20	3.6%	0	0.0%	31	4.2%
Making U-turn	5	3.2%	22	3.9%	0	0.0%	27	3.6%
Entering/Leaving Traffic Lane	4	2.6%	19	3.4%	0	0.0%	23	3.1%
Backing	7	4.5%	2	0.4%	0	0.0%	9	1.2%
Overtaking/Passing	0	0.0%	1	0.2%	0	0.0%	1	0.1%
Unknown/Other	4	2.6%	9	1.6%	0	0.0%	13	1.8%
Total	154	100.0%	563	100.0%	25	100.0%	742	100.0%

- For all motorcycle crashes, the leading maneuvers of vehicles other than motorcycles prior to the crash were straight ahead (33%) and turning left (27%).

Motorcycle Maneuver Prior to Motorcycle Crash (Utah 2016)

Motorcycles (Motorcycle Crash)								
Vehicle Maneuver	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Straight Ahead	99	56.6%	759	78.1%	36	87.8%	894	75.3%
Turning Left	13	7.4%	53	5.5%	1	2.4%	67	5.6%
Turning Right	6	3.4%	27	2.8%	0	0.0%	33	2.8%
Slowing in Traffic Lane	10	5.7%	43	4.4%	0	0.0%	53	4.5%
Stopped in Traffic Lane	20	11.4%	24	2.5%	1	2.4%	45	3.8%
Changing Lanes	4	2.3%	15	1.5%	0	0.0%	19	1.6%
Parked/Parking	14	8.0%	3	0.3%	0	0.0%	17	1.4%
Overtaking/Passing	2	1.1%	16	1.6%	0	0.0%	18	1.5%
Entering/Leaving Traffic Lane	1	0.6%	9	0.9%	0	0.0%	10	0.8%
Making U-turn	0	0.0%	3	0.3%	1	2.4%	4	0.3%
Backing	1	0.6%	1	0.1%	0	0.0%	2	0.2%
Other	3	1.7%	7	0.7%	1	2.4%	11	0.9%
Unknown	2	1.1%	12	1.2%	1	2.4%	15	1.3%
Total	175	100.0%	972	100.0%	41	100.0%	1,188	100.0%

- For all motorcycle crashes, the leading maneuver of motorcycles prior to the crash was straight ahead (75%).

Motorcycle Crash Conditions

Number of Vehicles Involved in Motorcycle Crashes (Utah 2016)

Motorcycle Crashes								
Vehicles Involved	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Motorcycle Only	36	20.8%	420	44.0%	18	43.9%	474	40.5%
Motorcycle and 1 or More Other Vehicles	137	79.2%	535	56.0%	23	56.1%	695	59.5%
Total	173	100.0%	955	100.0%	41	100.0%	1,169	100.0%

- In 60% of all motorcycle crashes there was the motorcycle and one or more other vehicles involved.

Contributing Factors of Drivers Other than Motorcyclists in Motorcycle Crashes (Utah 2016)

Drivers/Vehicles Other than Motorcycles (Motorcycle Crash)								
Contributing Factors	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Failed to Yield Right of Way	15	14.4%	203	40.8%	13	56.5%	231	37.0%
Improper Turn	11	10.6%	68	13.7%	1	4.3%	80	12.8%
Followed Too Closely	23	22.1%	28	5.6%	1	4.3%	52	8.3%
Other Improper Driving	8	7.7%	29	5.8%	0	0.0%	37	5.9%
Improper Lane Change	3	2.9%	25	5.0%	0	0.0%	28	4.5%
Disregard Traffic Signal/Sign	3	2.9%	21	4.2%	1	4.3%	25	4.0%
Driver Distraction	6	5.8%	18	3.6%	1	4.3%	25	4.0%
Vision Obscured by Moving Vehicle	3	2.9%	17	3.4%	0	0.0%	20	3.2%
Vision Obscured by Other	0	0.0%	15	3.0%	2	8.7%	17	2.7%
Driving Under the Influence	3	2.9%	8	1.6%	2	8.7%	13	2.1%
Hit and Run	2	1.9%	9	1.8%	1	4.3%	12	1.9%
Failed to Keep in Proper Lane	5	4.8%	6	1.2%	0	0.0%	11	1.8%
Vehicle Defective Condition	4	3.8%	7	1.4%	0	0.0%	11	1.8%
Vision Obscured by Parked Vehicle	2	1.9%	9	1.8%	0	0.0%	11	1.8%
Vision Obscured by Glare	0	0.0%	9	1.8%	0	0.0%	9	1.4%
Improper Backing	6	5.8%	2	0.4%	0	0.0%	8	1.3%
Speed Too Fast	4	3.8%	4	0.8%	0	0.0%	8	1.3%
Improper Parking/Stopping	4	3.8%	3	0.6%	0	0.0%	7	1.1%
Swerved or Evasive Action	1	1.0%	5	1.0%	0	0.0%	6	1.0%
Driver Illness/Medical	0	0.0%	3	0.6%	1	4.3%	4	0.6%
Driver Condition Other	1	1.0%	1	0.2%	0	0.0%	2	0.3%
Improper Signal	0	0.0%	2	0.4%	0	0.0%	2	0.3%
Driver Asleep/Fatigue	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Driver Emotional Prior to Crash	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Improper Passing	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Overcorrected	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Reckless/Aggressive Driving	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Wrong Side/Wrong Way	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Total	104	100.0%	498	100.0%	23	100.0%	625	100.0%

- Failed to yield right of way (37%), improper turn (13%), and followed too closely (8%) were the leading contributing factors for drivers other than motorcyclists in all motorcycle crashes.
- The leading contributing factor for fatal crashes was failed to yield right of way (57%).

Motorcycle Crash Conditions

Contributing Factors of Motorcycle Drivers in Crashes (Utah 2016)

Motorcycle Drivers/Vehicles								
Contributing Factors	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Speed Too Fast	7	6.0%	122	15.1%	15	37.5%	144	14.9%
Followed Too Closely	27	23.1%	92	11.4%	2	5.0%	121	12.5%
Failed to Keep in Proper Lane	7	6.0%	81	10.0%	0	0.0%	88	9.1%
Ran Off Road	5	4.3%	63	7.8%	10	25.0%	78	8.1%
Swerved or Evasive Action	2	1.7%	64	7.9%	0	0.0%	66	6.8%
Other Improper Driving	6	5.1%	51	6.3%	0	0.0%	57	5.9%
Failed to Yield Right of Way	8	6.8%	39	4.8%	1	2.5%	48	5.0%
Overcorrected	4	3.4%	35	4.3%	0	0.0%	39	4.0%
Driver Distraction	7	6.0%	28	3.5%	1	2.5%	36	3.7%
Reckless/Aggressive Driving	3	2.6%	28	3.5%	3	7.5%	34	3.5%
Driving Under the Influence	1	0.9%	28	3.5%	2	5.0%	31	3.2%
Disregard Traffic Signal/Sign	1	0.9%	22	2.7%	1	2.5%	24	2.5%
Vehicle Other Defective Condition	5	4.3%	18	2.2%	0	0.0%	23	2.4%
Improper Turn	7	6.0%	12	1.5%	0	0.0%	19	2.0%
Improper Passing	4	3.4%	13	1.6%	0	0.0%	17	1.8%
Vehicle Tires	2	1.7%	13	1.6%	1	2.5%	16	1.7%
Vehicle Brakes	0	0.0%	15	1.9%	0	0.0%	15	1.6%
Hit and Run	7	6.0%	7	0.9%	0	0.0%	14	1.5%
Vision Obscured by Other	0	0.0%	13	1.6%	1	2.5%	14	1.5%
Improper Lane Change	3	2.6%	8	1.0%	1	2.5%	12	1.2%
Improper Parking/Stopping	2	1.7%	10	1.2%	0	0.0%	12	1.2%
Driver Condition Other	2	1.7%	9	1.1%	0	0.0%	11	1.1%
Driver Illness/Medical	1	0.9%	7	0.9%	2	5.0%	10	1.0%
Vision Obscured by Moving Vehicle	3	2.6%	6	0.7%	0	0.0%	9	0.9%
Vision Obscured by Weather Condition	0	0.0%	7	0.9%	0	0.0%	7	0.7%
Vision Obscured by Glare	2	1.7%	4	0.5%	0	0.0%	6	0.6%
Driver Emotional Prior to Crash	1	0.9%	3	0.4%	0	0.0%	4	0.4%
Vision Obscured by Parked Vehicle	0	0.0%	4	0.5%	0	0.0%	4	0.4%
Wrong Side/Wrong Way	0	0.0%	3	0.4%	0	0.0%	3	0.3%
Disregard Road Markings	0	0.0%	1	0.1%	0	0.0%	1	0.1%
Driver Asleep/Fatigue	0	0.0%	1	0.1%	0	0.0%	1	0.1%
Vision Obscured by Vegetation	0	0.0%	1	0.1%	0	0.0%	1	0.1%
Total	117	100.0%	808	100.0%	40	100.0%	965	100.0%

- Speed too fast (15%), followed too closely (13%), failed to keep in proper lane (9%), and ran off road (8%) were the leading contributing factors for all motorcycle crashes.
- The leading contributing factors for fatal crashes were speed too fast (38%) and ran off road (25%).

Motorcycle Crash Conditions

Drivers Other than Motorcyclists in Motorcycle Crashes with Contributing Factors (Utah 2016)

Drivers/Vehicles Other than Motorcycles (Motorcycle Crash)								
Driver/Vehicle with a Contributing Factor(s)	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Yes	73	47.4%	347	61.6%	15	60.0%	435	58.6%
No	73	47.4%	204	36.2%	8	32.0%	285	38.4%
Unknown	8	5.2%	12	2.1%	2	8.0%	22	3.0%
Total	154	100.0%	563	100.0%	25	100.0%	742	100.0%

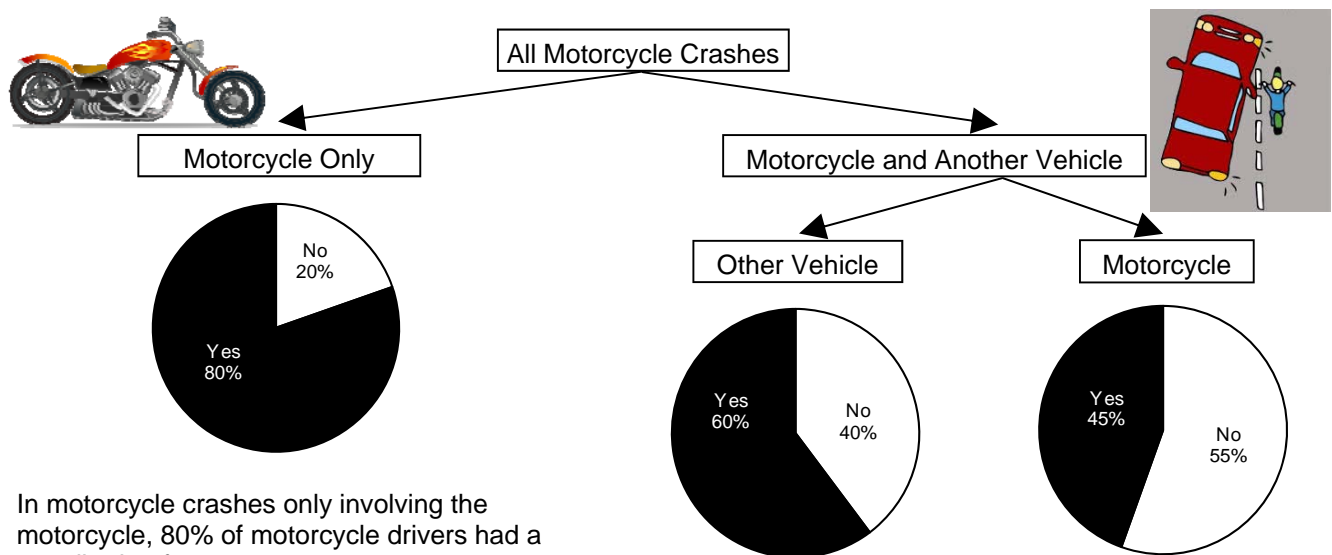
- 59% of drivers other than motorcyclists in motorcycle crashes had a contributing factor in total crashes.

Motorcycle Drivers in Crashes with Contributing Factors (Utah 2016)

Motorcycle Drivers/Vehicles								
Driver/Vehicle with a Contributing Factor(s)	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Yes	86	49.1%	551	56.7%	21	51.2%	658	55.4%
No	74	42.3%	390	40.1%	15	36.6%	479	40.3%
Unknown	15	8.6%	31	3.2%	5	12.2%	51	4.3%
Total	175	100.0%	972	100.0%	41	100.0%	1,188	100.0%

- 55% of motorcycle drivers had a contributing factor in total crashes.

Contributing Factor Summary in Motorcycle Crashes (Utah 2016)



- In motorcycle crashes only involving the motorcycle, 80% of motorcycle drivers had a contributing factor.
- In motorcycle crashes involving more than one vehicle, 45% of motorcycle drivers and 60% of drivers other than motorcyclists had a contributing factor.

Pedestrians



Section 11: Pedestrians

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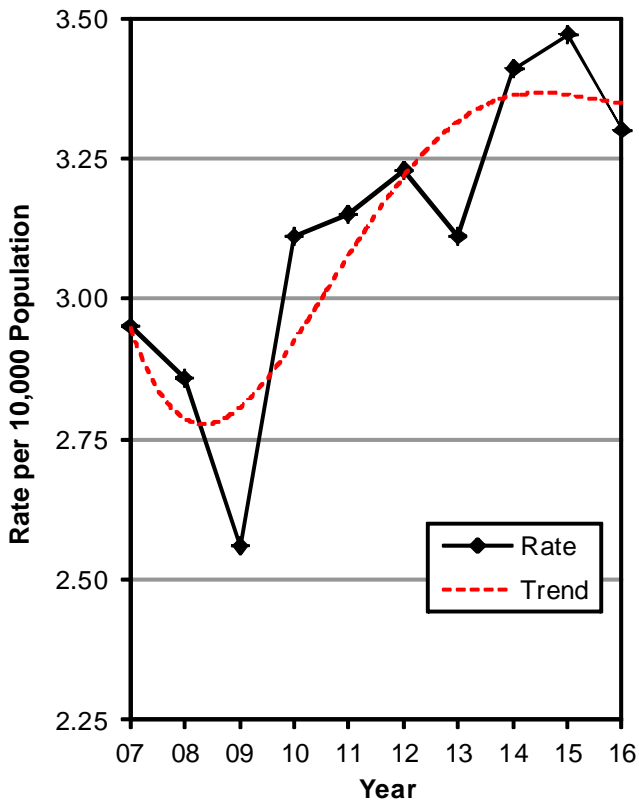
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Trends

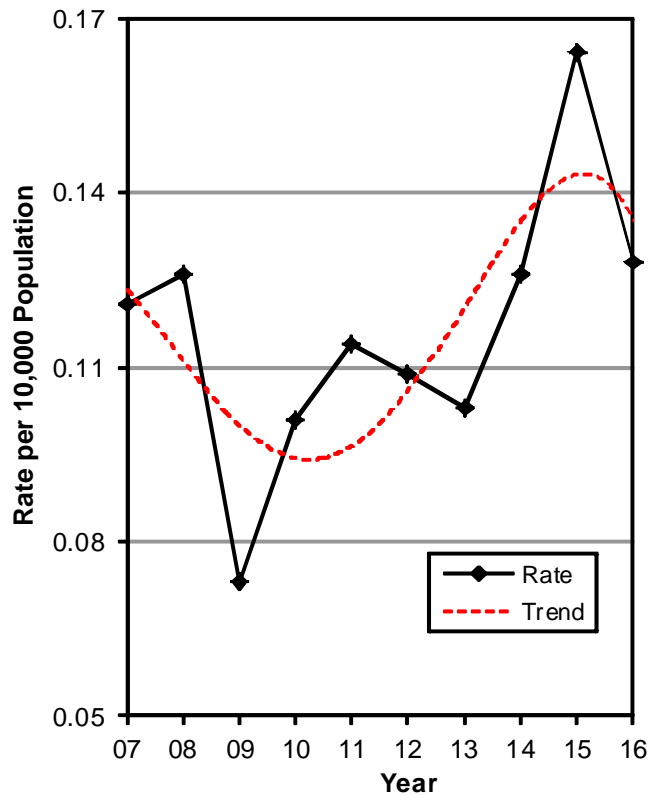
Pedestrians in Crashes (Utah 2007-2016)

Pedestrians									
Year	Non-Injured		Injured		Killed		Total		
	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	
2007	65	0.25	681	2.58	32	0.121	778	2.95	
2008	97	0.36	638	2.37	34	0.126	769	2.86	
2009	65	0.24	613	2.24	20	0.073	698	2.56	
2010	76	0.27	759	2.74	28	0.101	863	3.11	
2011	84	0.30	770	2.74	32	0.114	886	3.15	
2012	78	0.27	813	2.85	31	0.109	922	3.23	
2013	90	0.31	783	2.70	30	0.103	903	3.11	
2014	94	0.32	872	2.96	37	0.126	1,003	3.41	
2015	90	0.30	901	3.01	49	0.164	1,040	3.47	
2016	69	0.23	898	2.94	39	0.128	1,006	3.30	
Total	808	0.28	7,728	2.72	332	0.117	8,868	3.12	

Pedestrian Crash Rates Per Population (Utah 2007-2016)



Pedestrian Death Rates Per Population (Utah 2007-2016)



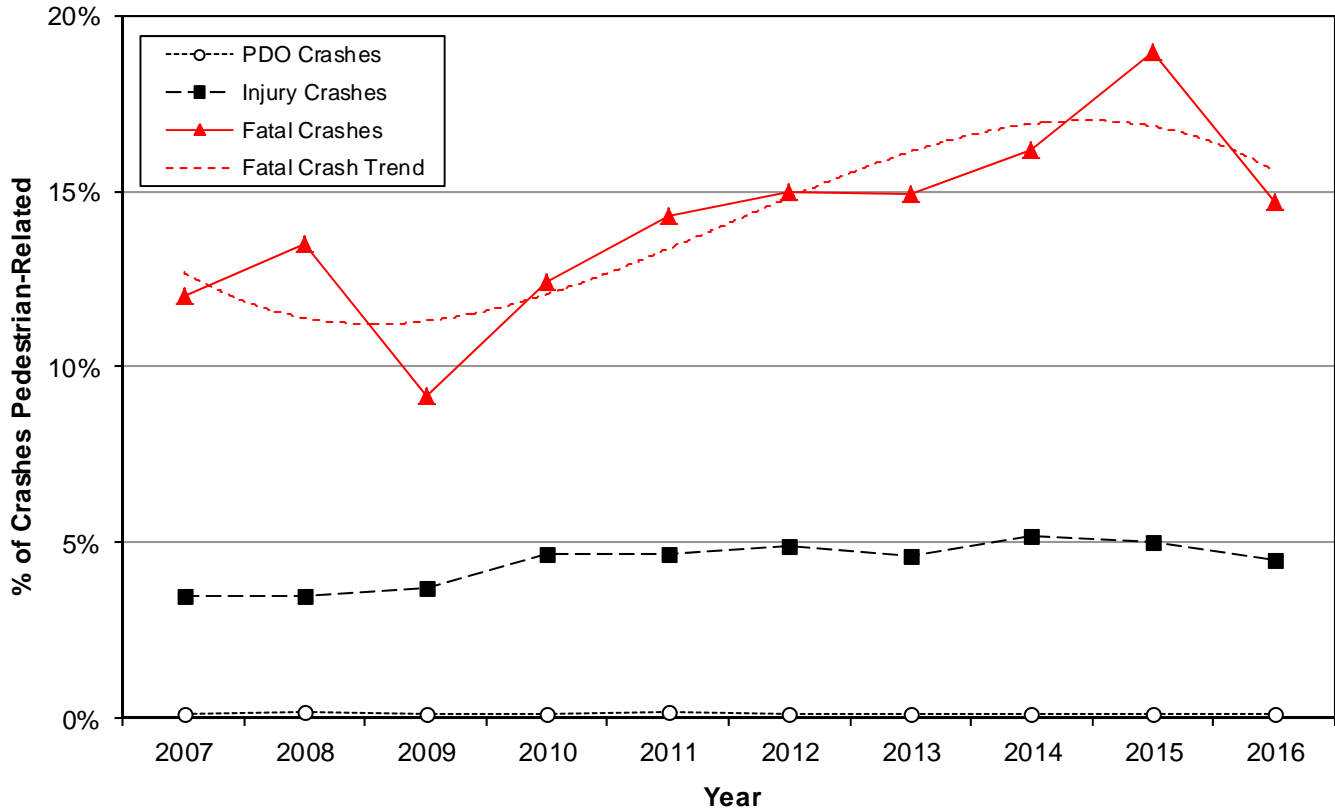
- The total rate per population of pedestrians in crashes increased 12% from 2007 to 2016.
- 2015 had the highest rate per population of total pedestrians in crashes in the last 10 years. 2009 had the lowest rate.
- The pedestrian death rate per population increased 6% from 2007 to 2016.
- 2015 had the highest rate per population of pedestrians killed in crashes (0.164), while 2009 had the lowest rate (0.073).

Trends

Pedestrian-Motor Vehicle Crashes (Utah 2007-2016)

Year	Property Damage Only			Injury			Fatal			Total		
	All	Pedestrian		All	Pedestrian		All	Pedestrian		All	Pedestrian	
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	40	0.1%	18,619	653	3.5%	258	31	12.0%	61,245	724	1.2%
2008	38,997	63	0.2%	17,125	605	3.5%	245	33	13.5%	56,367	701	1.2%
2009	35,398	43	0.1%	15,752	588	3.7%	217	20	9.2%	51,367	651	1.3%
2010	34,155	47	0.1%	14,995	707	4.7%	218	27	12.4%	49,368	781	1.6%
2011	36,418	56	0.2%	15,645	732	4.7%	224	32	14.3%	52,287	820	1.6%
2012	34,635	44	0.1%	15,765	779	4.9%	200	30	15.0%	50,600	853	1.7%
2013	39,301	50	0.1%	16,134	737	4.6%	202	30	14.9%	55,637	817	1.5%
2014	37,388	54	0.1%	16,426	855	5.2%	222	36	16.2%	54,036	945	1.7%
2015	42,089	40	0.1%	17,665	876	5.0%	258	49	19.0%	60,012	965	1.6%
2016	43,465	36	0.1%	18,747	848	4.5%	259	38	14.7%	62,471	922	1.5%
Total	384,214	473	0.1%	166,873	7,380	4.4%	2,303	326	14.2%	553,390	8,179	1.5%

Percent of Crashes Pedestrian-Related (Utah 2007-2016)

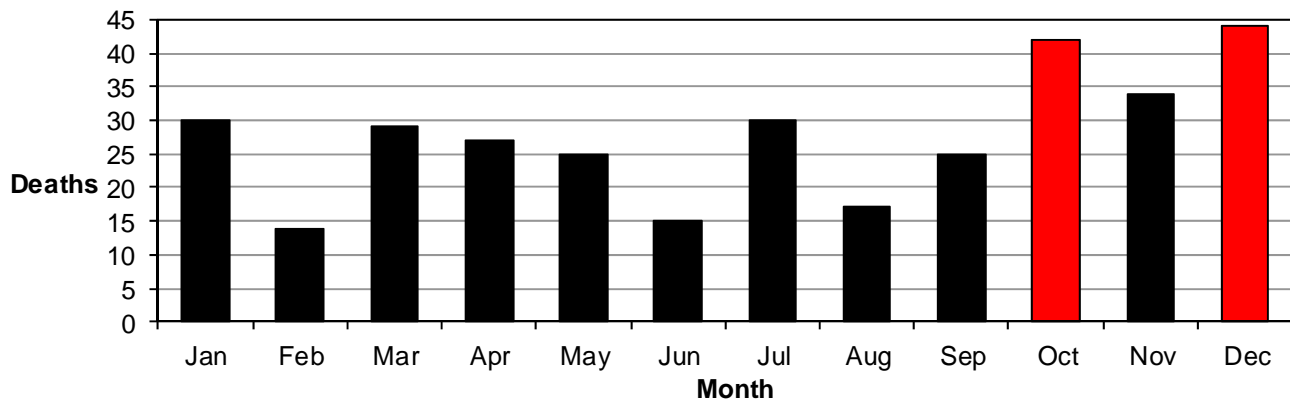


- The 10-year trend shows that pedestrian-motor vehicle crashes represent 0.1% of property damage only crashes, 4.4% of injury crashes, and 14.2% of fatal crashes.
- Pedestrians are over-represented in fatal crashes accounting for 14.2% of fatal crashes compared to 1.5% of total crashes.
- The percent of injury crashes with a pedestrian has been increasing over the past 10 years.
- During the last 10 years, the highest percent of fatal crashes involving pedestrians occurred in 2015 (19.0%).

Trends

Pedestrian Deaths by Month (Utah 2007-2016)

Month	Deaths										Total	
	Year										#	%
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016		
January	5	5	1	2	3	0	0	5	5	4	30	9.0%
February	1	0	2	1	0	2	1	0	3	4	14	4.2%
March	2	2	2	1	2	5	5	6	1	3	29	8.7%
April	4	1	2	3	1	3	3	5	2	3	27	8.1%
May	2	2	4	4	0	2	0	4	6	1	25	7.5%
June	1	0	0	1	3	0	1	1	4	4	15	4.5%
July	3	5	0	2	1	2	4	4	6	3	30	9.0%
August	0	5	1	0	3	1	2	0	5	0	17	5.1%
September	2	0	1	3	3	4	0	3	3	6	25	7.5%
October	3	3	3	3	5	6	4	5	7	3	42	12.7%
November	1	5	2	3	5	3	7	1	1	6	34	10.2%
December	8	6	2	5	6	3	3	3	6	2	44	13.3%
Total	32	34	20	28	32	31	30	37	49	39	332	100.0%



- Pedestrian-motor vehicle crash deaths were highest during the months of December and October over the past 10 years. Pedestrian deaths were lowest during the months of February and June.

Pedestrian Deaths by Day of Week (Utah 2007-2016)

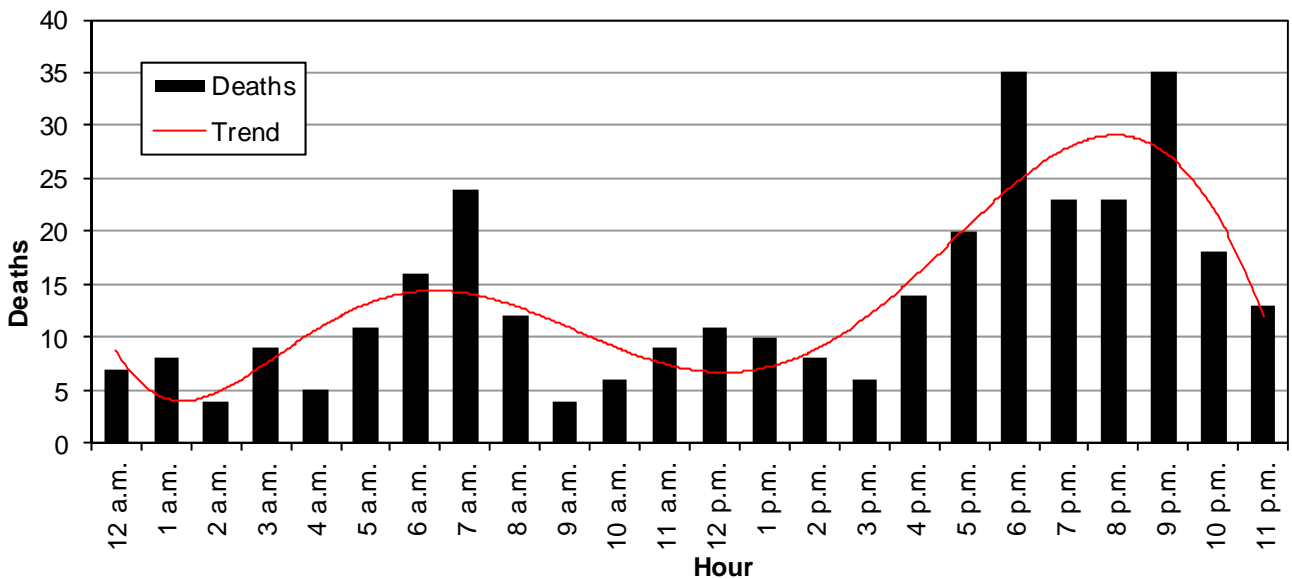
Day of Week	Deaths										Total	
	Year										#	%
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016		
Sunday	5	2	4	7	1	4	3	3	4	3	36	10.8%
Monday	3	2	3	0	6	4	7	6	5	7	43	13.0%
Tuesday	6	12	4	4	6	6	3	3	3	7	54	16.3%
Wednesday	8	4	5	2	3	7	2	4	6	8	49	14.8%
Thursday	3	3	2	8	5	3	5	5	11	1	46	13.9%
Friday	1	5	1	3	4	1	4	7	11	7	44	13.3%
Saturday	6	6	1	4	7	6	6	9	9	6	60	18.1%
Total	32	34	20	28	32	31	30	37	49	39	332	100.0%

- Pedestrian-motor vehicle crash deaths were highest on Saturday and Tuesday over the past 10 years.
- Pedestrian-motor vehicle crash deaths were lowest on Sunday and Monday over the past 10 years.

Trends

Pedestrian Deaths by Hour (Utah 2007-2016)

Hour	Deaths										Total	
	Year										#	%
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016		
Midnight	2	0	0	1	0	2	0	0	2	0	7	2.1%
1 a.m.	1	0	0	1	3	0	1	1	0	1	8	2.4%
2 a.m.	1	0	0	0	0	2	0	1	0	0	4	1.2%
3 a.m.	0	1	0	1	1	0	1	3	1	1	9	2.7%
4 a.m.	0	1	1	0	1	0	0	0	2	0	5	1.5%
5 a.m.	1	1	1	2	2	0	1	0	2	1	11	3.3%
6 a.m.	2	0	1	1	1	1	1	4	3	2	16	4.8%
7 a.m.	2	3	1	4	2	4	0	3	3	2	24	7.3%
8 a.m.	1	2	1	0	3	0	1	1	2	1	12	3.6%
9 a.m.	0	0	1	0	0	0	1	0	2	0	4	1.2%
10 a.m.	1	1	0	0	0	1	0	0	1	2	6	1.8%
11 a.m.	1	3	3	0	0	0	0	0	0	2	9	2.7%
Noon	3	0	1	2	2	0	1	0	1	1	11	3.3%
1 p.m.	0	2	0	0	0	1	1	2	1	3	10	3.0%
2 p.m.	1	1	1	3	0	0	1	0	0	1	8	2.4%
3 p.m.	0	1	2	0	1	1	0	1	0	0	6	1.8%
4 p.m.	1	0	2	0	0	3	1	2	1	4	14	4.2%
5 p.m.	3	3	0	1	3	2	3	2	3	0	20	6.0%
6 p.m.	2	6	1	3	4	3	5	3	5	3	35	10.6%
7 p.m.	2	0	2	3	3	0	3	1	4	5	23	6.9%
8 p.m.	2	2	1	3	2	5	1	2	2	3	23	6.9%
9 p.m.	0	6	0	2	2	4	5	3	9	4	35	10.6%
10 p.m.	2	1	1	1	0	2	1	4	4	2	18	5.4%
11 p.m.	4	0	0	0	2	0	2	3	1	1	13	3.9%
Total	32	34	20	28	32	31	30	36	49	39	331	100.0%



- Pedestrian-motor vehicle crash deaths were highest during the hours of 6 p.m. and 9 p.m..
- Pedestrian-motor vehicle crash deaths were lowest during the hours of 2 a.m., 9 a.m., and 4 a.m.

Trends

Pedestrians in Crashes by County (Utah 2007-2016)

Pedestrians													
County	Year										Total		Rate per Year per 10,000 Population
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%	
Salt Lake	363	384	371	438	431	476	479	499	528	542	4,511	50.9%	4.02
Grand	2	4	4	2	3	4	5	2	7	1	34	0.4%	3.55
Weber	70	70	61	84	76	81	87	102	104	80	815	9.2%	3.29
Carbon	8	6	7	2	9	6	10	7	4	2	61	0.7%	2.99
Summit	7	10	7	12	14	4	10	17	11	16	108	1.2%	2.68
Box Elder	8	8	13	7	20	4	18	11	12	27	128	1.4%	2.41
Davis	84	64	60	70	81	102	81	93	94	89	818	9.2%	2.39
Tooele	10	9	8	13	17	27	11	16	21	13	145	1.6%	2.24
Utah	146	115	95	124	146	126	125	158	134	145	1,314	14.8%	2.22
Cache	20	22	22	33	30	28	30	25	24	28	262	3.0%	2.13
Iron	10	10	11	8	12	8	8	8	21	10	106	1.2%	2.12
Sevier	2	8	5	3	3	3	5	5	3	3	40	0.5%	1.88
Washington	24	22	25	31	23	33	27	30	46	33	294	3.3%	1.83
Garfield	0	0	2	1	2	0	0	2	1	1	9	0.1%	1.81
Duchesne	1	7	2	2	6	4	0	7	3	2	34	0.4%	1.67
Juab	3	0	0	7	2	1	0	1	2	1	17	0.2%	1.54
Wasatch	7	4	1	12	3	1	3	0	7	9	47	0.5%	1.54
Emery	0	5	1	1	3	1	0	0	3	0	14	0.2%	1.37
Piute	0	0	0	0	0	2	0	0	0	0	2	0.0%	1.36
Beaver	1	0	2	2	0	1	0	1	0	0	7	0.1%	1.08
Uintah	7	2	1	6	3	2	1	7	5	3	37	0.4%	1.02
Morgan	0	2	0	1	1	1	0	6	0	0	11	0.1%	0.96
Daggett	0	0	0	0	0	0	0	0	1	0	1	0.0%	0.91
Millard	1	1	0	2	0	1	2	1	3	0	11	0.1%	0.87
Sanpete	1	13	0	2	0	4	0	2	2	1	25	0.3%	0.85
Wayne	1	0	0	0	0	0	0	1	0	0	2	0.0%	0.74
Kane	0	1	0	0	0	0	0	1	3	0	5	0.1%	0.68
San Juan	2	2	0	0	1	2	1	1	1	0	10	0.1%	0.59
Rich	0	0	0	0	0	0	0	0	0	0	0	0.0%	0.00
Total	778	769	698	863	886	922	903	1,003	1,040	1,006	8,868	100.0%	2.91

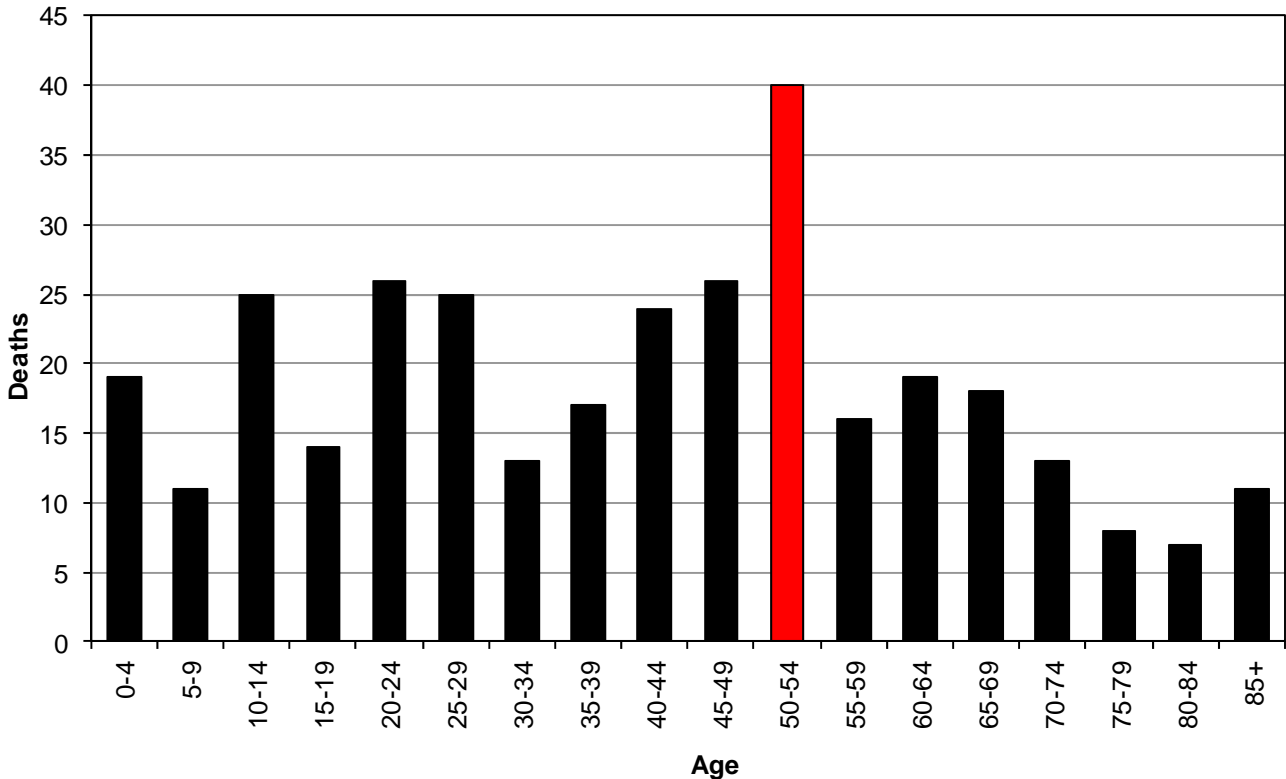
- Salt Lake (4.02), Grand (3.55), Weber (3.29), and Carbon (2.99) counties had the highest rates per population of total pedestrians in crashes per 10,000 population per year over the last 10 years.
- Salt Lake County accounted for 51% of the pedestrians in crashes. Utah County accounted for 15% of the pedestrians, Davis County accounted for 9% of the pedestrians, and Weber County accounted for 9% of the pedestrians. These four counties accounted for 84% of the pedestrians in crashes over the last 10 years.
- Rich County had no pedestrians in crashes.



Trends

Age of Pedestrians Killed (Utah 2007-2016)

Pedestrians Killed												
Age	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
0-4	2	2	0	2	1	2	1	1	5	3	19	5.7%
5-9	1	2	0	1	0	1	0	0	1	5	11	3.3%
10-14	0	3	0	3	5	1	2	3	4	4	25	7.5%
15-19	2	0	0	0	2	3	2	2	1	2	14	4.2%
20-24	4	2	3	2	5	1	2	4	3	0	26	7.8%
25-29	2	0	0	2	3	2	3	4	7	2	25	7.5%
30-34	2	1	1	1	3	0	1	1	1	2	13	3.9%
35-39	1	1	0	2	1	4	2	3	0	3	17	5.1%
40-44	3	1	1	2	0	0	1	6	6	4	24	7.2%
45-49	3	7	2	2	2	1	1	5	2	1	26	7.8%
50-54	5	5	3	1	6	8	3	0	3	6	40	12.0%
55-59	1	0	3	0	0	2	3	1	4	2	16	4.8%
60-64	2	0	2	4	1	2	4	1	3	0	19	5.7%
65-69	0	4	1	3	1	0	1	3	3	2	18	5.4%
70-74	1	2	0	1	1	0	2	1	4	1	13	3.9%
75-79	0	3	2	1	0	0	1	1	0	0	8	2.4%
80-84	0	1	1	1	0	2	1	0	0	1	7	2.1%
85+	3	0	1	0	1	2	0	1	2	1	11	3.3%
Total	32	34	20	28	32	31	30	37	49	39	332	100.0%

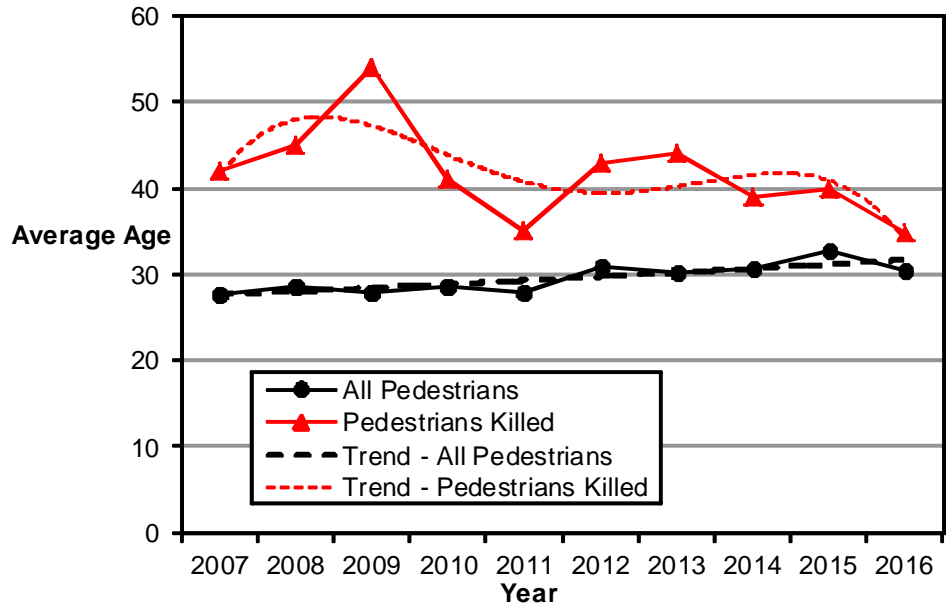


- Pedestrian deaths were highest among the age groups of 50-54, 20-29, 40-49, and 10-14 years.
- Pedestrian deaths were lowest among the age groups of 5-9 and 75+ years.

Trends

Average Age of Pedestrians (Utah 2007-2016)

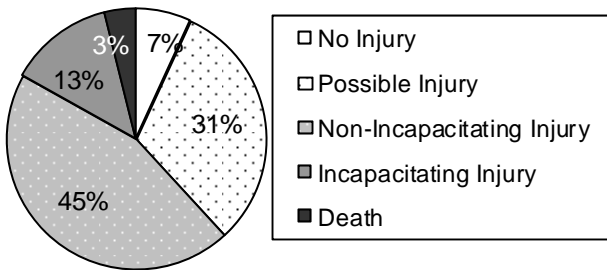
Pedestrians		
Year	Total Mean Age	Killed Mean Age
2007	27.70	42.00
2008	28.70	45.00
2009	28.00	54.00
2010	28.50	41.00
2011	28.00	35.00
2012	30.80	43.00
2013	30.20	44.00
2014	30.67	39.00
2015	32.71	39.80
2016	30.47	34.87
Avg.	29.58	41.77



- The average age of pedestrians in crashes has steadily increased over the last 10 years.
- Pedestrians who died were on average 12 years older than all pedestrians in crashes over the last 10 years.

Pedestrian-Motor Vehicle Crash Conditions

Injury Severity of Pedestrians in Crashes (Utah 2016)



- 89% of pedestrians in crashes sustained an injury.
- The percentage of pedestrians killed in crashes (3.9%) was much higher than the percentage for all persons killed in motor vehicle crashes (0.2%).
- Pedestrian crashes were 11 times more likely to result in a death than other motor vehicle crashes.

Gender of Pedestrians in Crashes (Utah 2016)

Pedestrians								
Gender	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Male	31	44.9%	521	58.0%	34	87.2%	586	58.3%
Female	28	40.6%	365	40.6%	5	12.8%	398	39.6%
Unknown	10	14.5%	12	1.3%	0	0.0%	22	2.2%
Total	69	100.0%	898	100.0%	39	100.0%	1,006	100.0%

- The majority of all pedestrians hit (58%) and pedestrians killed (87%) in crashes were male.

Pedestrian-Motor Vehicle Crash Conditions

Pedestrians in Crashes by County (Utah 2016)

Pedestrians								
County	Non-Injured		Injured		Killed		Total	
	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.
Box Elder	5	0.94	19	3.58	3	0.565	27	5.08
Salt Lake	29	0.26	490	4.37	23	0.205	542	4.83
Summit	2	0.50	14	3.47	0	0.000	16	3.97
Weber	4	0.16	75	3.03	1	0.040	80	3.23
Wasatch	0	0.00	9	2.95	0	0.000	9	2.95
Davis	11	0.32	73	2.13	5	0.146	89	2.60
Utah	8	0.14	135	2.28	2	0.034	145	2.45
Cache	0	0.00	27	2.20	1	0.081	28	2.28
Washington	1	0.06	31	1.93	1	0.062	33	2.06
Garfield	0	0.00	1	2.01	0	0.000	1	2.01
Tooele	2	0.31	10	1.54	1	0.154	13	2.01
Iron	3	0.60	7	1.40	0	0.000	10	2.00
Sevier	2	0.94	0	0.00	1	0.470	3	1.41
Grand	1	1.04	0	0.00	0	0.000	1	1.04
Duchesne	0	0.00	1	0.49	1	0.492	2	0.98
Carbon	0	0.00	2	0.98	0	0.000	2	0.98
Juab	0	0.00	1	0.91	0	0.000	1	0.91
Uintah	1	0.27	2	0.55	0	0.000	3	0.82
Sanpete	0	0.00	1	0.34	0	0.000	1	0.34
Beaver	0	0.00	0	0.00	0	0.000	0	0.00
Daggett	0	0.00	0	0.00	0	0.000	0	0.00
Emery	0	0.00	0	0.00	0	0.000	0	0.00
Kane	0	0.00	0	0.00	0	0.000	0	0.00
Millard	0	0.00	0	0.00	0	0.000	0	0.00
Morgan	0	0.00	0	0.00	0	0.000	0	0.00
Piute	0	0.00	0	0.00	0	0.000	0	0.00
Rich	0	0.00	0	0.00	0	0.000	0	0.00
San Juan	0	0.00	0	0.00	0	0.000	0	0.00
Wayne	0	0.00	0	0.00	0	0.000	0	0.00
Statewide	69	0.23	898	2.94	39	0.128	1,006	3.30

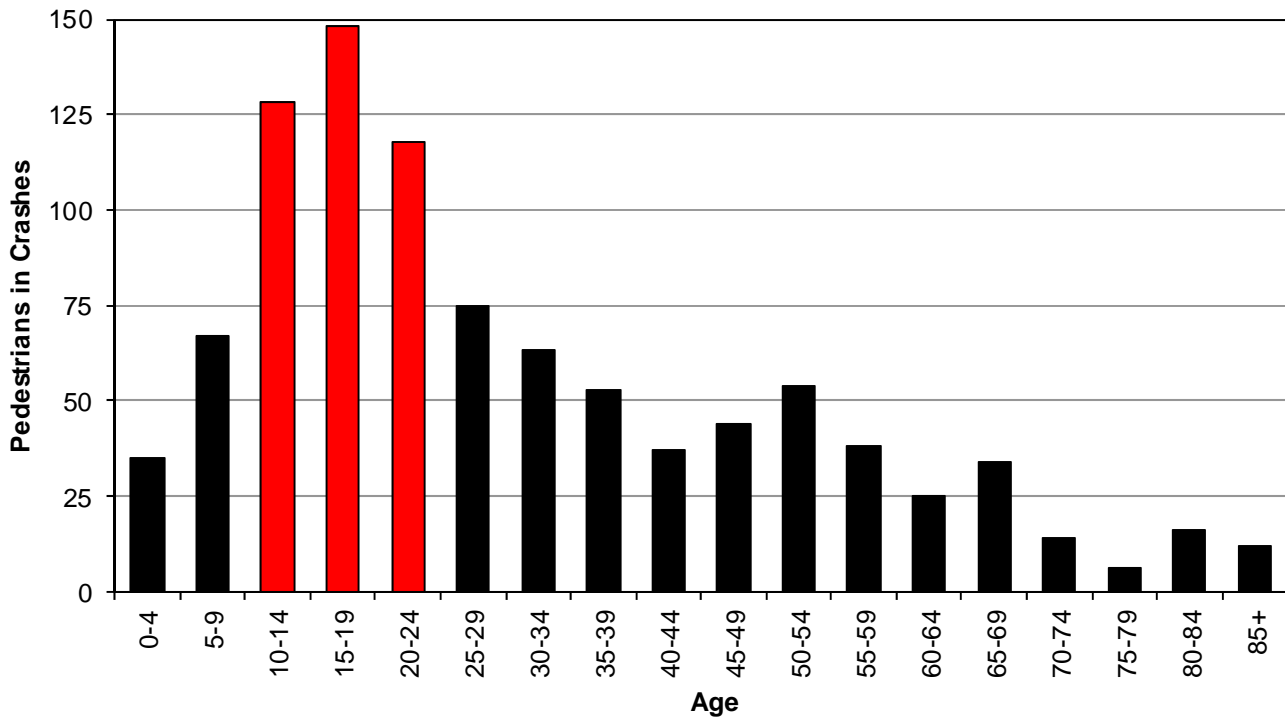
- Urban areas (3.55) had a much higher total pedestrian-motor vehicle crash rate per 10,000 population than rural areas (1.92).
- Box Elder (5.08), Salt Lake (4.83), and Summit (3.97) counties had the highest rates of pedestrians in crashes per 10,000 population.
- Salt Lake County accounted for 54% of the pedestrians in crashes and 59% of the pedestrian deaths.
- Beaver, Daggett, Emery, Kane, Millard, Morgan, Piute, Rich, San Juan, and Wayne counties had no pedestrians in crashes.

Pedestrians								
Location	Non-Injured		Injured		Killed		Total	
	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.
Urban	53	0.20	831	3.21	33	0.128	917	3.55
Rural	16	0.34	67	1.44	6	0.129	89	1.92
Total	69	0.23	898	2.94	39	0.128	1,006	3.30

Pedestrian-Motor Vehicle Crash Conditions

Age of Pedestrians in Crashes (Utah 2016)

Pedestrians								
Age	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
0-4	1	1.4%	31	3.5%	3	7.7%	35	3.5%
5-9	3	4.3%	59	6.6%	5	12.8%	67	6.7%
10-14	6	8.7%	118	13.1%	4	10.3%	128	12.7%
15-19	17	24.6%	129	14.4%	2	5.1%	148	14.7%
20-24	2	2.9%	116	12.9%	0	0.0%	118	11.7%
25-29	7	10.1%	66	7.3%	2	5.1%	75	7.5%
30-34	6	8.7%	55	6.1%	2	5.1%	63	6.3%
35-39	5	7.2%	45	5.0%	3	7.7%	53	5.3%
40-44	1	1.4%	32	3.6%	4	10.3%	37	3.7%
45-49	1	1.4%	42	4.7%	1	2.6%	44	4.4%
50-54	1	1.4%	47	5.2%	6	15.4%	54	5.4%
55-59	0	0.0%	36	4.0%	2	5.1%	38	3.8%
60-64	0	0.0%	25	2.8%	0	0.0%	25	2.5%
65-69	1	1.4%	31	3.5%	2	5.1%	34	3.4%
70-74	0	0.0%	13	1.4%	1	2.6%	14	1.4%
75-79	0	0.0%	6	0.7%	0	0.0%	6	0.6%
80-84	0	0.0%	15	1.7%	1	2.6%	16	1.6%
85+	1	1.4%	10	1.1%	1	2.6%	12	1.2%
Unknown	17	24.6%	22	2.4%	0	0.0%	39	3.9%
Total	69	100.0%	898	100.0%	39	100.0%	1,006	100.0%

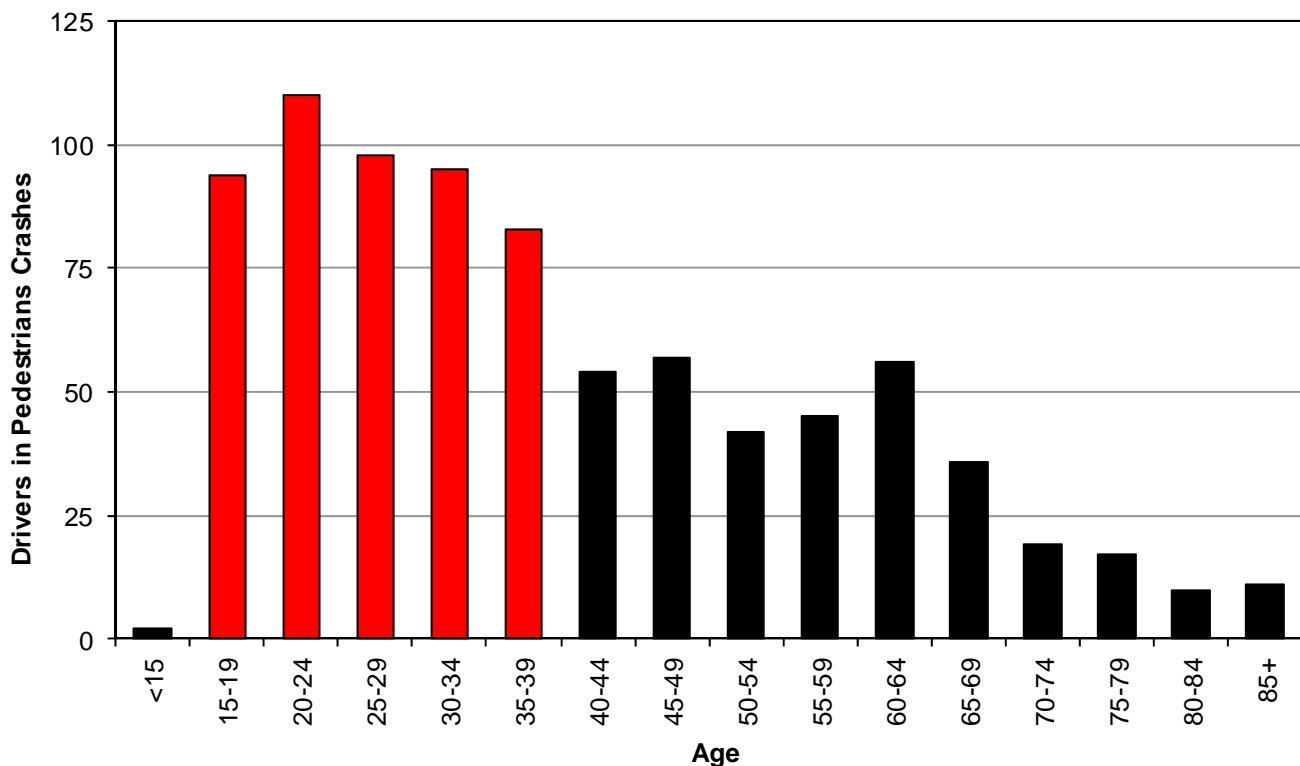


- Overall, the largest percentages of pedestrians in crashes were aged 10-24 years (39%).
- The highest percentage of pedestrian deaths occurred in the 5-9 and 50-54 year age groups.

Pedestrian-Motor Vehicle Crash Conditions

Driver Age (Utah 2016)

Drivers (Pedestrian-Motor Vehicle Crashes)								
Age	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
<15	0	0.0%	1	0.1%	1	2.4%	2	0.2%
15-19	5	10.2%	83	9.4%	6	14.6%	94	9.7%
20-24	4	8.2%	103	11.7%	3	7.3%	110	11.3%
25-29	8	16.3%	87	9.9%	3	7.3%	98	10.1%
30-34	6	12.2%	85	9.7%	4	9.8%	95	9.8%
35-39	6	12.2%	73	8.3%	4	9.8%	83	8.6%
40-44	2	4.1%	50	5.7%	2	4.9%	54	5.6%
45-49	4	8.2%	49	5.6%	4	9.8%	57	5.9%
50-54	5	10.2%	33	3.8%	4	9.8%	42	4.3%
55-59	3	6.1%	38	4.3%	4	9.8%	45	4.6%
60-64	0	0.0%	55	6.3%	1	2.4%	56	5.8%
65-69	2	4.1%	33	3.8%	1	2.4%	36	3.7%
70-74	1	2.0%	18	2.0%	0	0.0%	19	2.0%
75-79	0	0.0%	16	1.8%	1	2.4%	17	1.8%
80-84	0	0.0%	10	1.1%	0	0.0%	10	1.0%
85+	0	0.0%	11	1.3%	0	0.0%	11	1.1%
Unknown	3	6.1%	135	15.3%	3	7.3%	141	14.5%
Total	49	100.0%	880	100.0%	41	100.0%	970	100.0%



- Over one-half (58% of known) of drivers in total pedestrian-motor vehicle crashes were under 40 years.
- Drivers in fatal pedestrian-motor vehicle crashes was highest among the 15-19 year age group.
- The average age of a driver was 40 years.

Pedestrian-Motor Vehicle Crash Conditions

Driver Gender (Utah 2016)

Drivers (Pedestrian-Motor Vehicle Crashes)								
Gender	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Male	31	63.3%	435	49.4%	24	58.5%	490	50.5%
Female	16	32.7%	339	38.5%	14	34.1%	369	38.0%
Unknown	2	4.1%	106	12.0%	3	7.3%	111	11.4%
Total	49	100.0%	880	100.0%	41	100.0%	970	100.0%

- The majority of drivers in total pedestrian crashes (57% of known) and fatal crashes (63%) were male.

Pedestrian-Motor Vehicle Crashes by Month (Utah 2016)

Pedestrians								
Month	Non-Injured		Injured		Killed		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	7	0.23	74	2.39	4	0.13	85	2.74
February	3	0.10	59	2.03	4	0.14	66	2.28
March	4	0.13	68	2.19	3	0.10	75	2.42
April	2	0.07	52	1.73	3	0.10	57	1.90
May	6	0.19	71	2.29	1	0.03	78	2.52
June	9	0.30	59	1.97	4	0.13	72	2.40
July	6	0.19	73	2.35	3	0.10	82	2.65
August	9	0.29	69	2.23	0	0.00	78	2.52
September	5	0.17	95	3.17	6	0.20	106	3.53
October	5	0.16	94	3.03	3	0.10	102	3.29
November	8	0.27	100	3.33	6	0.20	114	3.80
December	5	0.16	84	2.71	2	0.06	91	2.94
Total	69	0.19	898	2.45	39	0.11	1,006	2.75

- November, September, and October had the highest rates per day of total pedestrian-motor vehicle crashes.
- September and November had the highest rates per day of pedestrian deaths.

Pedestrian-Motor Vehicle Crashes by Day of Week (Utah 2016)

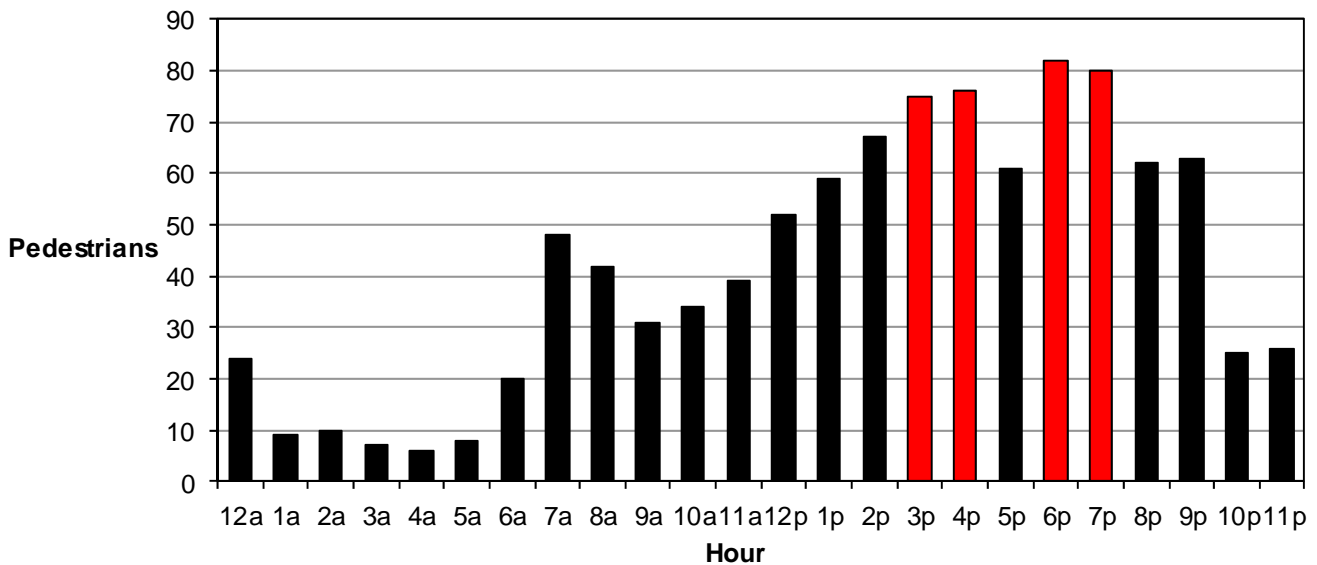
Pedestrians								
Day of Week	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Sunday	5	7.2%	68	7.6%	3	7.7%	76	7.6%
Monday	8	11.6%	141	15.7%	7	17.9%	156	15.5%
Tuesday	13	18.8%	155	17.3%	7	17.9%	175	17.4%
Wednesday	10	14.5%	135	15.0%	8	20.5%	153	15.2%
Thursday	12	17.4%	166	18.5%	1	2.6%	179	17.8%
Friday	8	11.6%	141	15.7%	7	17.9%	156	15.5%
Saturday	13	18.8%	92	10.2%	6	15.4%	111	11.0%
Total	69	100.0%	898	100.0%	39	100.0%	1,006	100.0%

- The highest percentage of total pedestrian-motor vehicle crashes (18%) occurred on Thursday.
- Wednesday had the highest number of pedestrian deaths.

Pedestrian-Motor Vehicle Crash Conditions

Pedestrian-Motor Vehicle Crashes by Hour (Utah 2016)

Pedestrians								
Hour	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Midnight	2	2.9%	22	2.4%	0	0.0%	24	2.4%
1 a.m.	0	0.0%	8	0.9%	1	2.6%	9	0.9%
2 a.m.	1	1.4%	9	1.0%	0	0.0%	10	1.0%
3 a.m.	1	1.4%	5	0.6%	1	2.6%	7	0.7%
4 a.m.	0	0.0%	6	0.7%	0	0.0%	6	0.6%
5 a.m.	0	0.0%	7	0.8%	1	2.6%	8	0.8%
6 a.m.	0	0.0%	18	2.0%	2	5.1%	20	2.0%
7 a.m.	1	1.4%	45	5.0%	2	5.1%	48	4.8%
8 a.m.	0	0.0%	41	4.6%	1	2.6%	42	4.2%
9 a.m.	4	5.8%	27	3.0%	0	0.0%	31	3.1%
10 a.m.	2	2.9%	30	3.3%	2	5.1%	34	3.4%
11 a.m.	3	4.3%	34	3.8%	2	5.1%	39	3.9%
Noon	5	7.2%	46	5.1%	1	2.6%	52	5.2%
1 p.m.	6	8.7%	50	5.6%	3	7.7%	59	5.9%
2 p.m.	5	7.2%	61	6.8%	1	2.6%	67	6.7%
3 p.m.	8	11.6%	67	7.5%	0	0.0%	75	7.5%
4 p.m.	4	5.8%	68	7.6%	4	10.3%	76	7.6%
5 p.m.	3	4.3%	58	6.5%	0	0.0%	61	6.1%
6 p.m.	5	7.2%	74	8.2%	3	7.7%	82	8.2%
7 p.m.	5	7.2%	70	7.8%	5	12.8%	80	8.0%
8 p.m.	4	5.8%	55	6.1%	3	7.7%	62	6.2%
9 p.m.	6	8.7%	53	5.9%	4	10.3%	63	6.3%
10 p.m.	2	2.9%	21	2.3%	2	5.1%	25	2.5%
11 p.m.	2	2.9%	23	2.6%	1	2.6%	26	2.6%
Total	69	100.0%	898	100.0%	39	100.0%	1,006	100.0%



- Total pedestrian-motor vehicle crashes were highest between 3:00 p.m. and 7:59 p.m.
- Fatal pedestrian-motor vehicle crashes were highest during the 7:00 p.m., 4:00 p.m., and 9:00 p.m. hours.

Pedestrian-Motor Vehicle Crash Conditions

Contributing Factors of Pedestrians in Crashes (Utah 2016)

Pedestrians								
Contributing Factors	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
None	34	49.3%	457	50.9%	11	28.2%	502	49.9%
Improper Crossing	6	8.7%	94	10.5%	10	25.6%	110	10.9%
Darting	8	11.6%	66	7.3%	6	15.4%	80	8.0%
Not Visible	2	2.9%	48	5.3%	1	2.6%	51	5.1%
Inattentive	1	1.4%	40	4.5%	1	2.6%	42	4.2%
Failure to Obey Traffic Signs/Signals	1	1.4%	29	3.2%	1	2.6%	31	3.1%
In Roadway Improperly	3	4.3%	23	2.6%	1	2.6%	27	2.7%
Failure to Yield Right of Way	0	0.0%	23	2.6%	1	2.6%	24	2.4%
Other	3	4.3%	46	5.1%	2	5.1%	51	5.1%
Unknown	11	15.9%	72	8.0%	5	12.8%	88	8.7%
Total	69	100.0%	898	100.0%	39	100.0%	1,006	100.0%

- Improper crossing and darting were the leading contributing factors for pedestrians in total crashes.
- No contributing factors were listed for 32% (of known) of the pedestrians killed and 55% of total pedestrians.

Location of Pedestrians in Crashes (Utah 2016)

Pedestrians								
Pedestrian Location	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Marked Crosswalk at Intersection	22	31.9%	366	40.8%	5	12.8%	393	39.1%
In Roadway (not at intersection/crosswalk)	12	17.4%	185	20.6%	26	66.7%	223	22.2%
Unmarked Crosswalk	7	10.1%	67	7.5%	3	7.7%	77	7.7%
Sidewalk	2	2.9%	59	6.6%	1	2.6%	62	6.2%
Mid-Block Crosswalk	5	7.2%	45	5.0%	0	0.0%	50	5.0%
Shoulder	4	5.8%	41	4.6%	3	7.7%	48	4.8%
Outside Right of Way	1	1.4%	7	0.8%	0	0.0%	8	0.8%
Median/Island	1	1.4%	4	0.4%	1	2.6%	6	0.6%
Path/Trail (bike or shared use)	0	0.0%	3	0.3%	0	0.0%	3	0.3%
Other	7	10.1%	94	10.5%	0	0.0%	101	10.0%
Unknown	8	11.6%	27	3.0%	0	0.0%	35	3.5%
Total	69	100.0%	898	100.0%	39	100.0%	1,006	100.0%

- Over half (52%) of pedestrians struck by motor vehicles were in a crosswalk.
- In roadway (not at intersection/crosswalk) accounted for two-thirds of the locations for pedestrians killed.

Alcohol Test Results of Pedestrians Killed (Utah 2016)

Pedestrian Deaths			
Alcohol Test Results	#	%	% of tested
0.00	23	59.0%	82.1%
0.01-0.07	1	2.6%	3.6%
0.08+	4	10.3%	14.3%
Not Tested	11	28.2%	n/a
Total	39	100.0%	100.0%

- 72% of pedestrians killed in crashes were tested for alcohol. Of these 82% had a blood alcohol concentration (BAC) of 0.00, 4% had a BAC of 0.01-0.07, and 14% had a BAC of 0.08+.

Pedestrian-Motor Vehicle Crash Conditions

Action of Pedestrians in Crashes (Utah 2016)

Pedestrian Action	Pedestrians							
	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Entering or Crossing Road	38	55.1%	573	63.8%	25	64.1%	636	63.2%
In Roadway Other	8	11.6%	57	6.3%	6	15.4%	71	7.1%
Walking on Sidewalk	3	4.3%	44	4.9%	0	0.0%	47	4.7%
Walking Along Roadway with Traffic	0	0.0%	30	3.3%	2	5.1%	32	3.2%
Walking Along Roadway Against Traffic	0	0.0%	24	2.7%	0	0.0%	24	2.4%
Adjacent to Roadway	2	2.9%	19	2.1%	1	2.6%	22	2.2%
Waiting to Cross Roadway	3	4.3%	18	2.0%	0	0.0%	21	2.1%
Going to/from School	1	1.4%	12	1.3%	0	0.0%	13	1.3%
Working on Vehicle	1	1.4%	10	1.1%	0	0.0%	11	1.1%
Working in Trafficway	0	0.0%	10	1.1%	0	0.0%	10	1.0%
Pushing Motor Vehicle	0	0.0%	2	0.2%	0	0.0%	2	0.2%
Other	6	8.7%	77	8.6%	4	10.3%	87	8.6%
Unknown	7	10.1%	22	2.4%	1	2.6%	30	3.0%
Total	69	100.0%	898	100.0%	39	100.0%	1,006	100.0%

- The leading actions of pedestrians in total crashes were entering/crossing road and in roadway other.
- The leading actions of pedestrians killed were entering/crossing road and in roadway other.

Vehicle Maneuver Prior to Crash (Utah 2016)

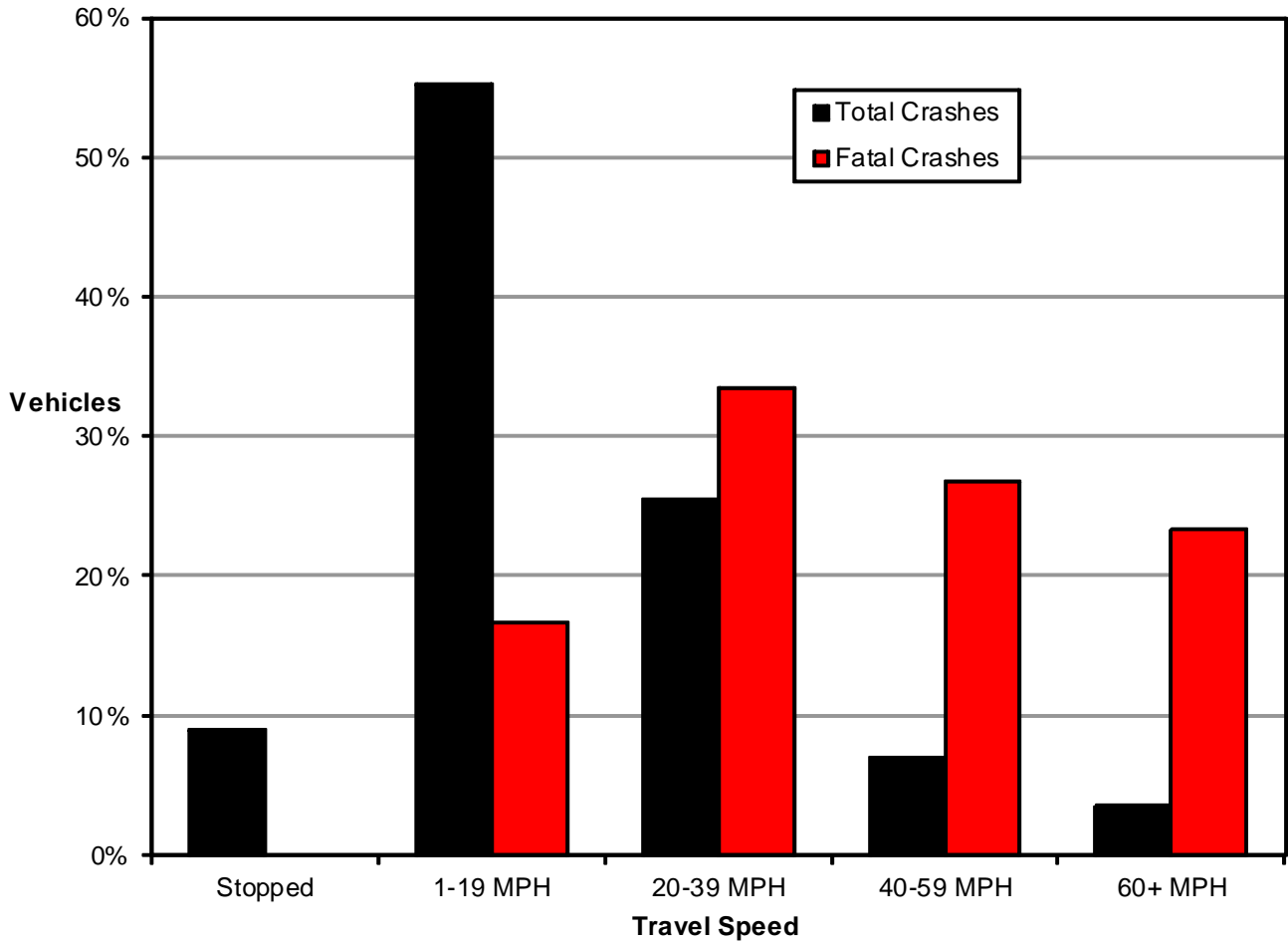
Vehicle Maneuver	Vehicles (Pedestrian-Motor Vehicle Crashes)							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Straight Ahead	28	49.1%	425	46.2%	31	75.6%	484	47.5%
Turning Left	2	3.5%	153	16.6%	3	7.3%	158	15.5%
Turning Right	1	1.8%	151	16.4%	0	0.0%	152	14.9%
Backing	3	5.3%	61	6.6%	3	7.3%	67	6.6%
Parked/Parking	5	8.8%	39	4.2%	0	0.0%	44	4.3%
Stopped/Slowing in Traffic Lane	11	19.3%	25	2.7%	0	0.0%	36	3.5%
Entering/Leaving Traffic Lane	1	1.8%	13	1.4%	0	0.0%	14	1.4%
Changing Lanes	0	0.0%	6	0.7%	2	4.9%	8	0.8%
Making U-Turn	1	1.8%	1	0.1%	0	0.0%	2	0.2%
Overtaking/Passing	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Other	3	5.3%	15	1.6%	1	2.4%	19	1.9%
Unknown	2	3.5%	31	3.4%	1	2.4%	34	3.3%
Total	57	100.0%	920	100.0%	41	100.0%	1,018	100.0%

- The leading vehicle maneuvers prior to the crash were straight ahead (48%), turning left (16%), and turning right (15%).

Pedestrian-Motor Vehicle Crash Conditions

Travel Speed of Vehicles in Pedestrian Crashes (Utah 2016)

Vehicles (Pedestrian-Motor Vehicle Crashes)								
Travel Speed	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Parked	5	8.8%	31	3.4%	0	0.0%	36	3.5%
Stopped	9	15.8%	15	1.6%	0	0.0%	24	2.4%
1-9 MPH	8	14.0%	211	22.9%	3	7.3%	222	21.8%
10-19 MPH	6	10.5%	140	15.2%	2	4.9%	148	14.5%
20-29 MPH	4	7.0%	86	9.3%	2	4.9%	92	9.0%
30-39 MPH	6	10.5%	62	6.7%	8	19.5%	76	7.5%
40-49 MPH	2	3.5%	26	2.8%	6	14.6%	34	3.3%
50-59 MPH	4	7.0%	7	0.8%	2	4.9%	13	1.3%
60-69 MPH	2	3.5%	7	0.8%	4	9.8%	13	1.3%
70+ MPH	2	3.5%	6	0.7%	3	7.3%	11	1.1%
Unknown	9	15.8%	329	35.8%	11	26.8%	349	34.3%
Total	57	100.0%	920	100.0%	41	100.0%	1,018	100.0%



- The higher the speed of the vehicle the more likely the pedestrian was injured or killed in a crash.
- Pedestrians hit by a vehicle traveling 30 MPH or higher were 12.7 times more likely to die.
- While 1% of pedestrians hit by a vehicle traveling 1-19 MPH died, 17% of pedestrians struck by a vehicle traveling 40-59 MPH died, and 29% of pedestrians died who were struck by a vehicle traveling 60+ MPH.

Pedestrian-Motor Vehicle Crash Conditions

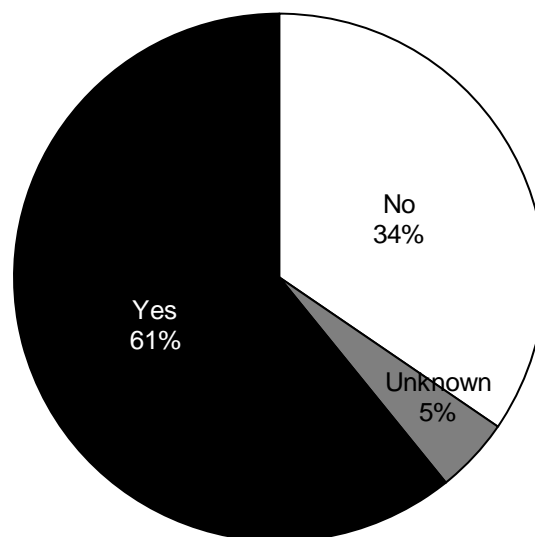
Pedestrian-Motor Vehicle Crashes by Speed Limit (Utah 2016)

Vehicles (Pedestrian-Motor Vehicle Crashes)								
Speed Limit	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
5-15 MPH	2	3.5%	35	3.8%	0	0.0%	37	3.6%
20-25 MPH	5	8.8%	173	18.8%	7	17.1%	185	18.2%
30-35 MPH	11	19.3%	187	20.3%	10	24.4%	208	20.4%
40-45 MPH	13	22.8%	123	13.4%	9	22.0%	145	14.2%
50-55 MPH	5	8.8%	18	2.0%	3	7.3%	26	2.6%
60-65 MPH	1	1.8%	3	0.3%	3	7.3%	7	0.7%
70+ MPH	6	10.5%	12	1.3%	3	7.3%	21	2.1%
Unknown	14	24.6%	369	40.1%	6	14.6%	389	38.2%
Total	57	100.0%	920	100.0%	41	100.0%	1,018	100.0%

- The majority (86% of known) of total pedestrian crashes occurred where the speed limit was 20-45 MPH.
- The majority (74% of known) of fatal pedestrian crashes occurred where the speed limit was 20-45 MPH.

Drivers in Pedestrian Crashes with Contributing Factors (Utah 2016)

Drivers/Vehicles (Pedestrian-Motor Vehicle Crashes)								
Driver/Vehicle with a Contributing Factor(s)	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Yes	29	50.9%	570	62.0%	20	48.8%	619	60.8%
No	27	47.4%	307	33.4%	18	43.9%	352	34.6%
Unknown	1	1.8%	43	4.7%	3	7.3%	47	4.6%
Total	57	100.0%	920	100.0%	41	100.0%	1,018	100.0%



- 61% of drivers in total pedestrian crashes had a contributing factor.
- 49% of drivers in fatal pedestrian crashes had a contributing factor.

Pedestrian-Motor Vehicle Crash Conditions

Driver Contributing Factors in Pedestrian Crashes (Utah 2016)

Drivers/Vehicles (Pedestrian-Motor Vehicle Crashes)								
Contributing Factors	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Failed to Yield Right of Way	6	11.1%	324	33.5%	4	11.8%	334	31.7%
Hit and Run	5	9.3%	93	9.6%	3	8.8%	101	9.6%
Other Improper Driving	3	5.6%	87	9.0%	1	2.9%	91	8.6%
Driver Distraction	4	7.4%	66	6.8%	6	17.6%	76	7.2%
Vision Obscured by Weather Condition	2	3.7%	51	5.3%	2	5.9%	55	5.2%
Improper Backing	1	1.9%	38	3.9%	1	2.9%	40	3.8%
Speed Too Fast	5	9.3%	26	2.7%	8	23.5%	39	3.7%
Vision Obscured by Glare	0	0.0%	32	3.3%	0	0.0%	32	3.0%
Failed to Keep in Proper Lane	3	5.6%	24	2.5%	1	2.9%	28	2.7%
Disregard Traffic Signal/Sign	0	0.0%	25	2.6%	0	0.0%	25	2.4%
Followed Too Closely	8	14.8%	13	1.3%	0	0.0%	21	2.0%
Vehicle Other Defective Condition	2	3.7%	18	1.9%	0	0.0%	20	1.9%
Vision Obscured by Parked Vehicle	2	3.7%	17	1.8%	0	0.0%	19	1.8%
Driving Under the Influence	3	5.6%	11	1.1%	2	5.9%	16	1.5%
Improper Turn	0	0.0%	16	1.7%	0	0.0%	16	1.5%
Vision Obscured by Moving Vehicle	0	0.0%	16	1.7%	0	0.0%	16	1.5%
Reckless/Aggressive Driving	0	0.0%	11	1.1%	3	8.8%	14	1.3%
Driver Condition Other	0	0.0%	13	1.3%	0	0.0%	13	1.2%
Vision Obscured by Other	2	3.7%	11	1.1%	0	0.0%	13	1.2%
Ran Off Road	2	3.7%	10	1.0%	0	0.0%	12	1.1%
Swerved or Evasive Action	2	3.7%	9	0.9%	0	0.0%	11	1.0%
Improper Parking/Stopping	1	1.9%	9	0.9%	0	0.0%	10	0.9%
Vision Obscured by Building, Sign	1	1.9%	9	0.9%	0	0.0%	10	0.9%
Disregard Road Markings	0	0.0%	7	0.7%	0	0.0%	7	0.7%
Windshield or Other Window Obscured	0	0.0%	6	0.6%	0	0.0%	6	0.6%
Vehicle Brakes	0	0.0%	5	0.5%	0	0.0%	5	0.5%
Driver Emotional Prior to Crash	0	0.0%	3	0.3%	1	2.9%	4	0.4%
Driver Illness/Medical	0	0.0%	4	0.4%	0	0.0%	4	0.4%
Vision Obscured by Vegetation	1	1.9%	3	0.3%	0	0.0%	4	0.4%
Wrong Side/Wrong Way	0	0.0%	4	0.4%	0	0.0%	4	0.4%
Driver Asleep/Fatigue	0	0.0%	2	0.2%	1	2.9%	3	0.3%
Improper Lane Change	1	1.9%	0	0.0%	1	2.9%	2	0.2%
Improper Passing	0	0.0%	2	0.2%	0	0.0%	2	0.2%
Overcorrected	0	0.0%	1	0.1%	0	0.0%	1	0.1%
Improper Signal	0	0.0%	0	0.0%	0	0.0%	0	0.0%
Total	54	100.0%	966	100.0%	34	100.0%	1,054	100.0%

- Failed to yield right of way (32%), hit and run (10%), and driver distraction (7%) were the leading contributing factors in total pedestrian-motor vehicle crashes.
- Speed too fast (24%) and driver distraction (18%) and were the leading contributing factors in fatal pedestrian-motor vehicle crashes.

Bicyclists



Section 12: Bicyclists

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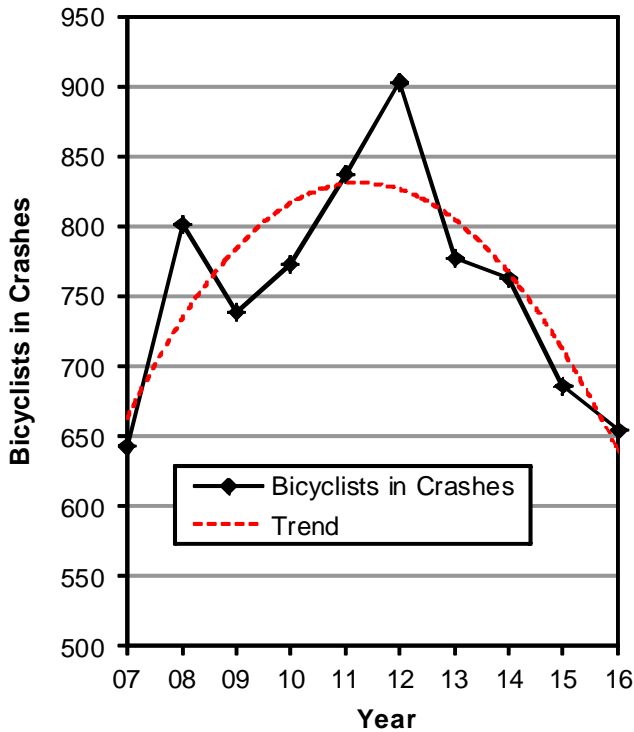
6

Trends

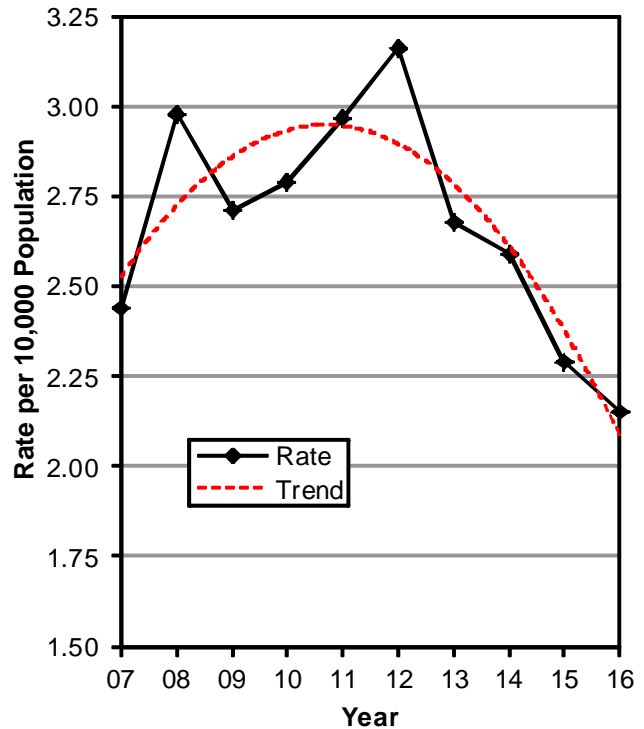
Bicyclists in Crashes (Utah 2007-2016)

Year	Bicyclists							
	Non-Injured		Injured		Killed		Total	
	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.
2007	53	0.20	584	2.22	6	0.023	643	2.44
2008	90	0.33	708	2.63	4	0.015	802	2.98
2009	83	0.30	651	2.38	5	0.018	739	2.71
2010	86	0.31	680	2.45	7	0.025	773	2.79
2011	85	0.30	747	2.65	5	0.018	837	2.97
2012	63	0.22	837	2.93	3	0.011	903	3.16
2013	83	0.29	688	2.37	6	0.021	777	2.68
2014	69	0.23	685	2.33	9	0.031	763	2.59
2015	46	0.15	635	2.12	5	0.017	686	2.29
2016	37	0.12	613	2.01	5	0.016	655	2.15
Total	695	0.24	6,828	2.40	55	0.019	7,578	2.67

Bicyclists in Crashes (Utah 2007-2016)



Bicyclist Crash Rates Per Population (Utah 2007-2016)



- On average, 760 bicyclists are in crashes every year.
- The total number of bicyclists in crashes has steadily decreased the last four years.
- 2012 had the highest number of bicyclists in crashes (903).

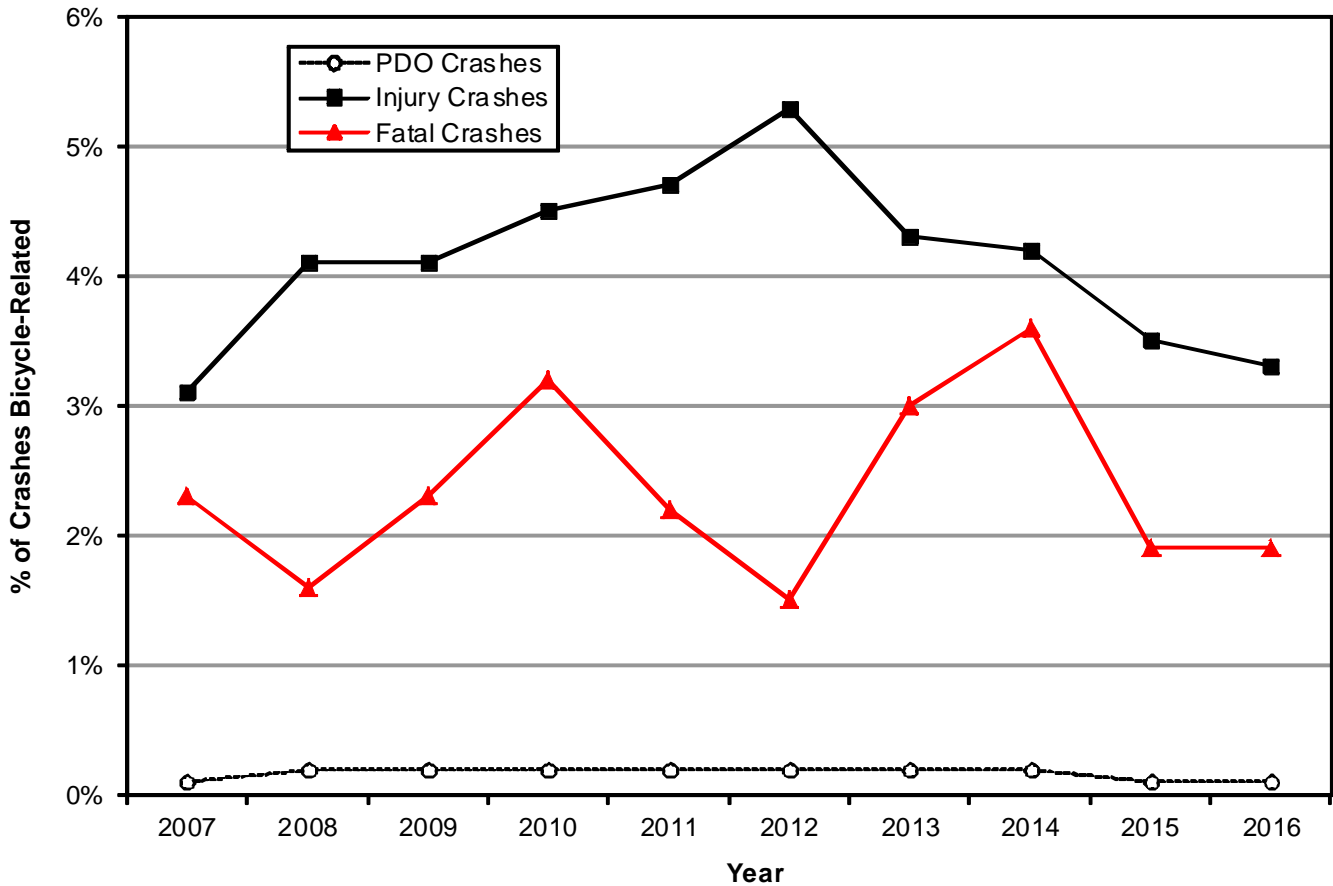
- The total rate per population of bicyclists in crashes decreased 11% over the last 10 years.
- 2016 had the lowest bicyclist crash rate per population (2.15).
- 2012 had the highest bicyclist crash rate per population (3.16).

Trends

Bicycle-Motor Vehicle Crashes (Utah 2007-2016)

Year	Property Damage Only			Injury			Fatal			Total		
	All	Bicycle		All	Bicycle		All	Bicycle		All	Bicycle	
	#	#	%	#	#	%	#	#	%	#	#	%
2007	42,368	46	0.1%	18,619	579	3.1%	258	6	2.3%	61,245	631	1.0%
2008	38,997	83	0.2%	17,125	697	4.1%	245	4	1.6%	56,367	784	1.4%
2009	35,398	83	0.2%	15,752	651	4.1%	217	5	2.3%	51,367	739	1.4%
2010	34,155	78	0.2%	14,995	669	4.5%	218	7	3.2%	49,368	754	1.5%
2011	36,418	73	0.2%	15,645	735	4.7%	224	5	2.2%	52,287	813	1.6%
2012	34,635	59	0.2%	15,765	833	5.3%	200	3	1.5%	50,600	895	1.8%
2013	39,301	74	0.2%	16,134	686	4.3%	202	6	3.0%	55,637	766	1.4%
2014	37,388	60	0.2%	16,426	684	4.2%	222	8	3.6%	54,036	752	1.4%
2015	42,089	38	0.1%	17,665	627	3.5%	258	5	1.9%	60,012	670	1.1%
2016	43,465	31	0.1%	18,747	613	3.3%	259	5	1.9%	62,471	649	1.0%
Total	384,214	625	0.2%	166,873	6,774	4.1%	2,303	54	2.3%	553,390	7,453	1.3%

Percent of Crashes Involving a Bicyclist (Utah 2007-2016)

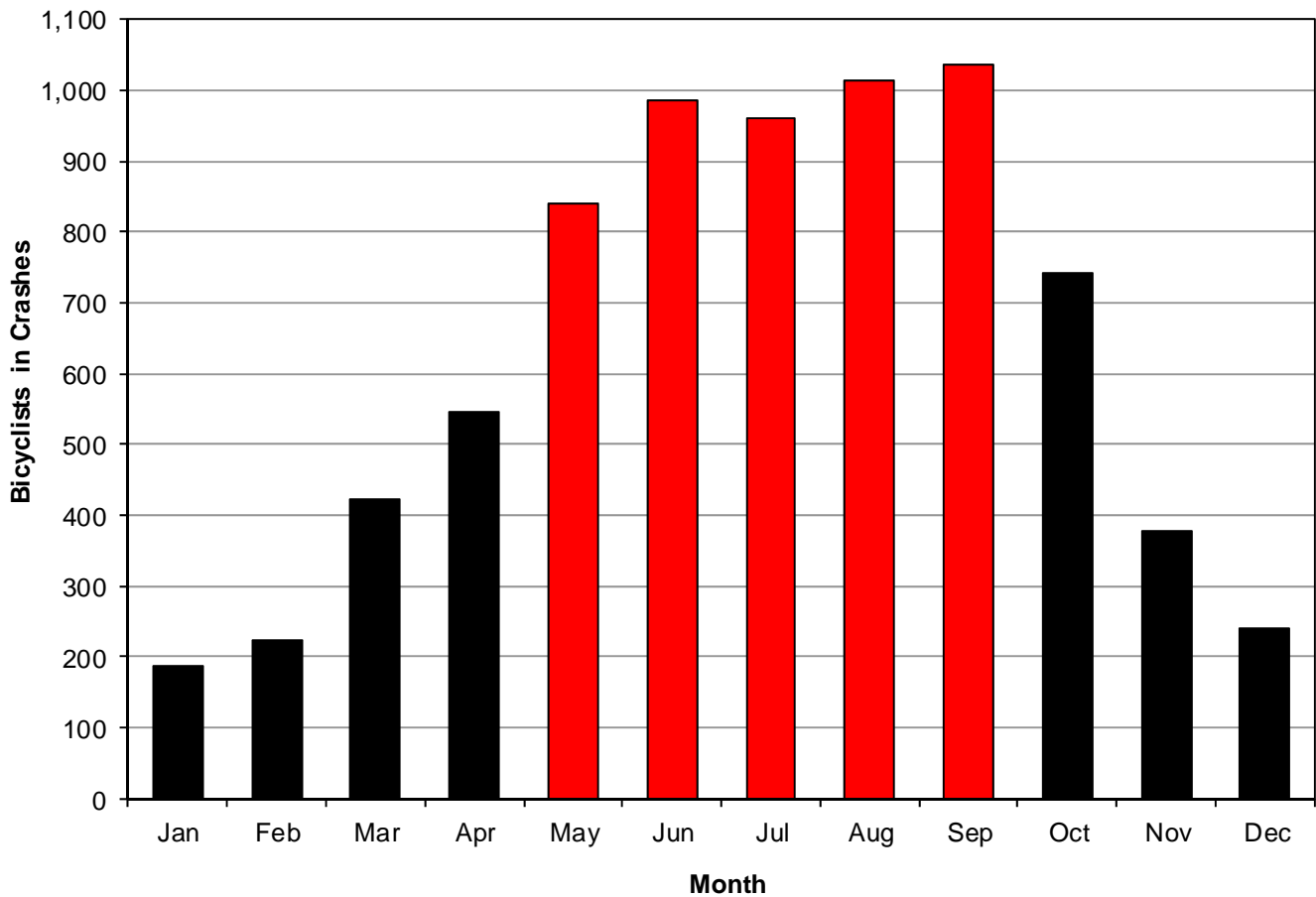


- The 10-year trend shows that bicycle-motor vehicle crashes represent 0.2% of property damage only crashes, 4.1% of injury crashes, and 2.3% of fatal crashes.
- During the last 10 years, 7,453 crashes involved a bicyclist. There are approximately 680 injury crashes and five fatal crashes involving bicyclists a year.

Trends

Bicyclists in Crashes by Month (Utah 2007-2016)

Month	Bicyclists										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
January	14	14	13	25	18	30	11	27	23	12	187	2.5%
February	13	11	29	23	15	33	16	23	36	25	224	3.0%
March	43	30	35	38	53	54	36	51	45	38	423	5.6%
April	59	49	57	47	38	73	56	57	56	53	545	7.2%
May	73	90	101	76	74	112	100	75	68	72	841	11.1%
June	86	103	88	104	124	108	106	102	81	85	987	13.0%
July	75	106	86	113	117	86	111	101	85	80	960	12.7%
August	86	123	114	99	124	112	121	76	70	89	1,014	13.4%
September	78	137	115	114	119	110	87	100	97	80	1,037	13.7%
October	70	75	46	71	90	100	73	90	73	54	742	9.8%
November	32	37	36	43	33	51	43	33	28	42	378	5.0%
December	14	27	19	20	32	34	17	28	24	25	240	3.2%
Total	643	802	739	773	837	903	777	763	686	655	7,578	100.0%

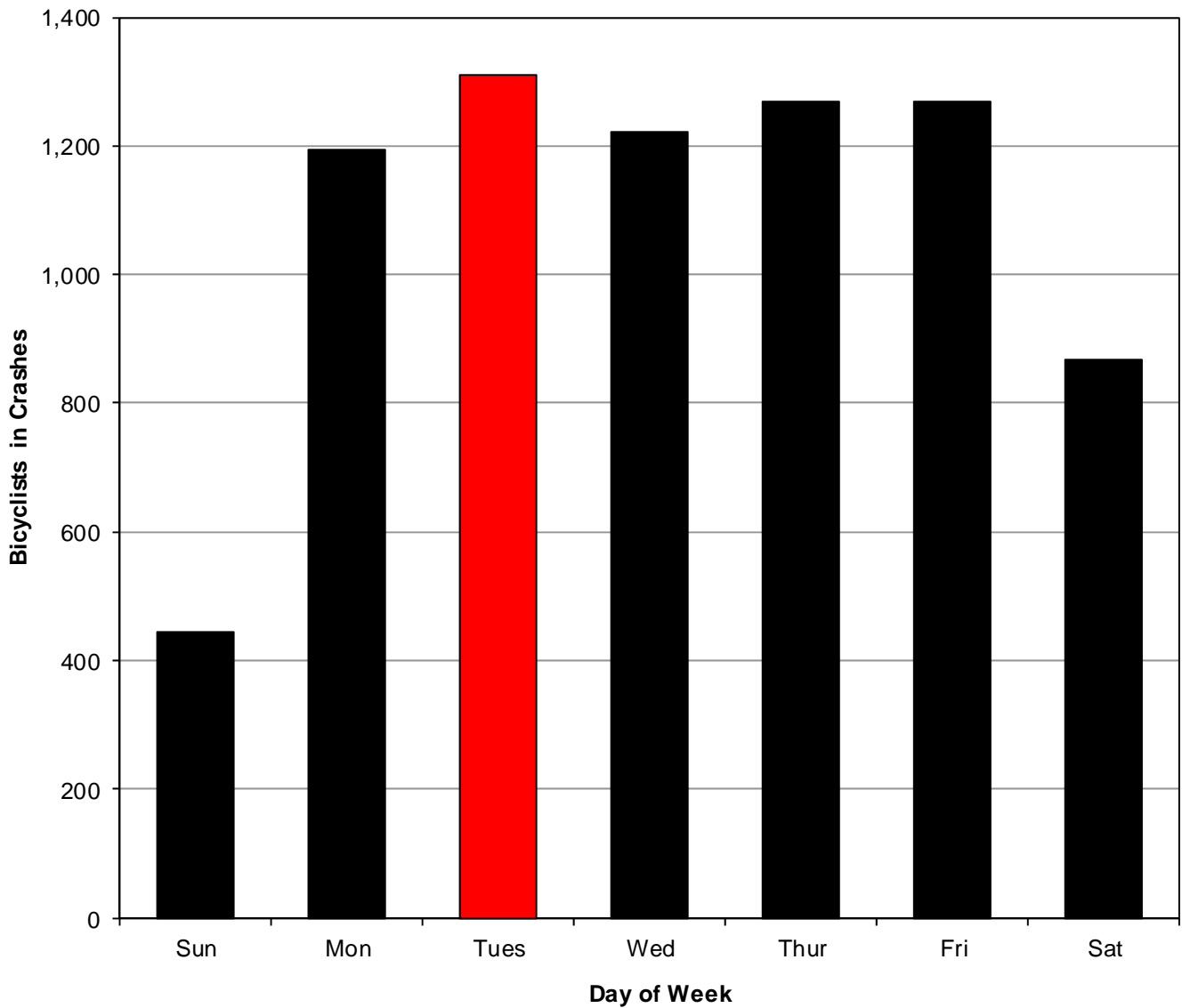


- Bicycle-motor vehicle crashes were highest during the months of May through September over the past 10 years.
- Bicycle-motor vehicle crashes were lowest during the months of December through February over the past 10 years.

Trends

Bicyclists in Crashes by Day of Week (Utah 2007-2016)

Day of Week	Bicyclists										Total	
	Year										#	%
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016		
Sunday	35	41	38	51	52	60	46	34	54	34	445	5.9%
Monday	114	124	102	143	140	108	123	126	115	100	1,195	15.8%
Tuesday	106	139	151	133	160	163	136	130	101	90	1,309	17.3%
Wednesday	95	136	133	122	129	151	117	116	109	115	1,223	16.1%
Thursday	105	129	105	139	142	169	120	128	107	125	1,269	16.7%
Friday	116	132	120	102	127	158	151	146	111	105	1,268	16.7%
Saturday	72	101	90	83	87	94	84	83	89	86	869	11.5%
Total	643	802	739	773	837	903	777	763	686	655	7,578	100.0%

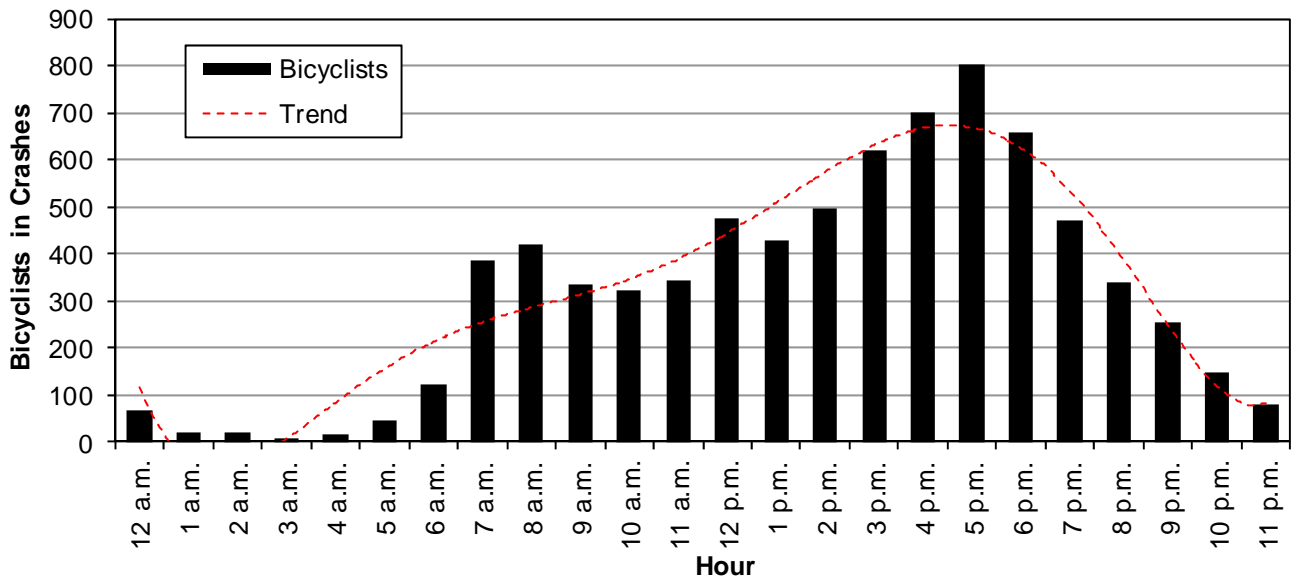


- Bicycle-motor vehicle crashes were highest Monday through Friday over the past 10 years.
- Bicycle-motor vehicle crashes were lowest on Sunday over the past 10 years.

Trends

Bicyclists in Crashes by Hour (Utah 2007-2016)

Bicyclists												
Hour	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
Midnight	5	7	5	4	13	8	7	6	7	4	66	0.9%
1 a.m.	1	0	6	2	1	4	1	4	2	0	21	0.3%
2 a.m.	0	5	0	5	0	4	0	3	2	2	21	0.3%
3 a.m.	0	3	1	0	1	1	1	1	0	0	8	0.1%
4 a.m.	1	3	1	3	0	3	2	3	1	0	17	0.2%
5 a.m.	4	8	3	7	3	3	8	4	4	2	46	0.6%
6 a.m.	11	8	7	9	14	17	14	14	15	14	123	1.6%
7 a.m.	41	39	43	44	39	45	41	34	32	26	384	5.1%
8 a.m.	40	42	40	29	44	57	48	32	44	43	419	5.5%
9 a.m.	22	38	22	31	34	40	32	42	39	33	333	4.4%
10 a.m.	26	29	31	35	39	43	35	34	29	22	323	4.3%
11 a.m.	31	47	29	27	36	39	37	32	36	29	343	4.5%
Noon	39	40	53	60	60	54	45	47	35	43	476	6.3%
1 p.m.	37	37	46	42	56	52	49	49	31	31	430	5.7%
2 p.m.	31	52	51	54	54	55	53	48	56	42	496	6.5%
3 p.m.	49	79	70	54	66	77	57	57	52	57	618	8.2%
4 p.m.	62	66	66	73	61	84	85	87	47	71	702	9.3%
5 p.m.	73	86	77	96	94	99	73	80	66	60	804	10.6%
6 p.m.	60	64	61	69	81	77	61	58	67	58	656	8.7%
7 p.m.	44	57	40	50	59	49	42	53	52	26	472	6.2%
8 p.m.	34	32	39	33	32	42	41	24	32	31	340	4.5%
9 p.m.	17	35	20	28	24	24	23	30	21	30	252	3.3%
10 p.m.	11	12	16	13	18	19	12	14	11	23	149	2.0%
11 p.m.	4	13	12	5	8	7	10	7	5	8	79	1.0%
Total	643	802	739	773	837	903	777	763	686	655	7,578	100.0%



- Bicycle-motor vehicle crashes were highest during the hours of 3:00-6:59 p.m.
- Bicycle-motor vehicle crashes were lowest during the hours of 1:00-4:59 a.m.

Trends

Bicyclists in Crashes by County (Utah 2007-2016)

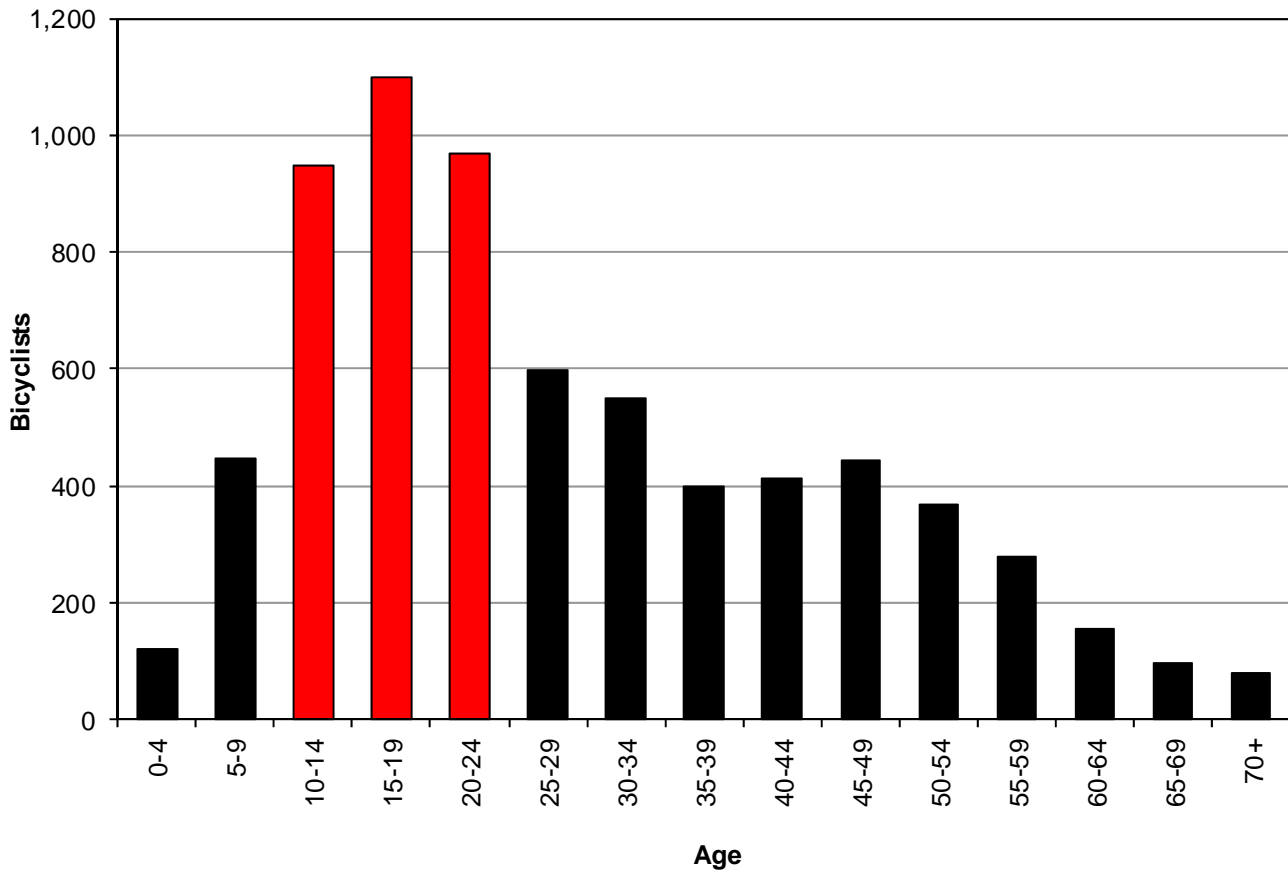
Bicyclists													
County	Year										Total		Rate per Year per 10,000 Population
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%	
Salt Lake	341	416	392	399	435	484	417	392	356	348	3,980	52.5%	3.55
Cache	28	40	28	39	39	30	32	33	27	17	313	4.1%	2.55
Grand	2	3	0	0	3	4	1	3	6	2	24	0.3%	2.51
Utah	113	159	138	154	168	164	122	103	116	109	1,346	17.8%	2.27
Weber	40	42	38	52	50	83	53	71	43	55	527	7.0%	2.13
Davis	60	58	59	67	69	64	74	69	52	68	640	8.4%	1.87
Washington	23	28	43	20	26	26	34	38	43	18	299	3.9%	1.87
Iron	8	12	10	8	5	9	7	12	9	4	84	1.1%	1.68
Carbon	3	3	3	3	6	1	2	4	7	2	34	0.4%	1.67
Summit	3	7	5	8	4	7	5	9	2	4	54	0.7%	1.34
Tooele	5	12	6	4	9	5	7	13	7	8	76	1.0%	1.17
Sevier	1	3	1	4	1	1	4	3	3	2	23	0.3%	1.08
Wasatch	3	2	2	6	6	2	3	1	3	4	32	0.4%	1.05
Uintah	5	2	3	3	4	7	5	2	5	2	38	0.5%	1.04
Box Elder	5	5	7	3	4	6	5	5	2	4	46	0.6%	0.87
Garfield	0	1	1	1	0	0	0	0	0	1	4	0.1%	0.80
Duchesne	1	3	0	0	1	4	3	0	0	2	14	0.2%	0.69
Kane	0	1	0	0	1	1	1	1	0	0	5	0.1%	0.68
Emery	0	1	0	1	1	0	0	1	1	1	6	0.1%	0.59
Sanpete	2	2	0	1	2	4	0	2	1	1	15	0.2%	0.51
Rich	0	0	1	0	0	0	0	0	0	0	1	0.0%	0.43
Millard	0	0	1	0	1	0	0	0	1	2	5	0.1%	0.39
Wayne	0	0	1	0	0	0	0	0	0	0	1	0.0%	0.37
Beaver	0	0	0	0	1	1	0	0	0	0	2	0.0%	0.31
San Juan	0	1	0	0	1	0	1	0	2	0	5	0.1%	0.30
Juab	0	0	0	0	0	0	1	0	0	1	2	0.0%	0.18
Morgan	0	1	0	0	0	0	0	1	0	0	2	0.0%	0.17
Daggett	0	0	0	0	0	0	0	0	0	0	0	0.0%	0.00
Piute	0	0	0	0	0	0	0	0	0	0	0	0.0%	0.00
Total	643	802	739	773	837	903	777	763	686	655	7,578	100.0%	2.48

- Salt Lake (3.55), Cache (2.55), Grand (2.51), and Utah (2.27) counties had the highest rates per population of total bicyclists in crashes per 10,000 population per year over the last 10 years.
- Salt Lake County accounted for 53% of the bicyclists in crashes. Utah County accounted for 18% of the bicyclists and Davis County accounted for 8% of the bicyclists. These three counties accounted for over three-fourths (79%) of the bicyclists in crashes over the last 10 years.
- Daggett and Piute counties had no bicyclists in crashes.

Trends

Bicyclists in Crashes by Age (Utah 2007-2016)

Bicyclists												
Age	Year										Total	
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	#	%
0-4	38	24	7	8	7	8	10	9	2	6	119	1.7%
5-9	49	50	52	44	63	48	38	40	24	38	446	6.4%
10-14	99	122	94	114	115	99	91	71	77	68	950	13.6%
15-19	85	116	97	124	126	134	104	128	95	89	1,098	15.8%
20-24	70	95	90	103	125	114	112	88	94	79	970	13.9%
25-29	41	67	67	62	65	73	72	54	50	48	599	8.6%
30-34	40	40	47	59	62	75	55	59	58	54	549	7.9%
35-39	36	29	27	37	37	53	41	53	38	48	399	5.7%
40-44	32	42	38	43	42	53	39	36	51	38	414	5.9%
45-49	36	44	52	42	45	52	35	50	47	40	443	6.4%
50-54	29	21	32	33	40	58	40	42	35	39	369	5.3%
55-59	24	23	17	21	28	38	27	32	29	39	278	4.0%
60-64	9	8	12	9	18	25	14	23	18	18	154	2.2%
65-69	6	8	9	7	9	9	13	8	12	15	96	1.4%
70+	7	6	4	4	8	13	9	8	9	12	80	1.1%
Total	601	695	645	710	790	852	700	701	639	631	6,964	100.0%

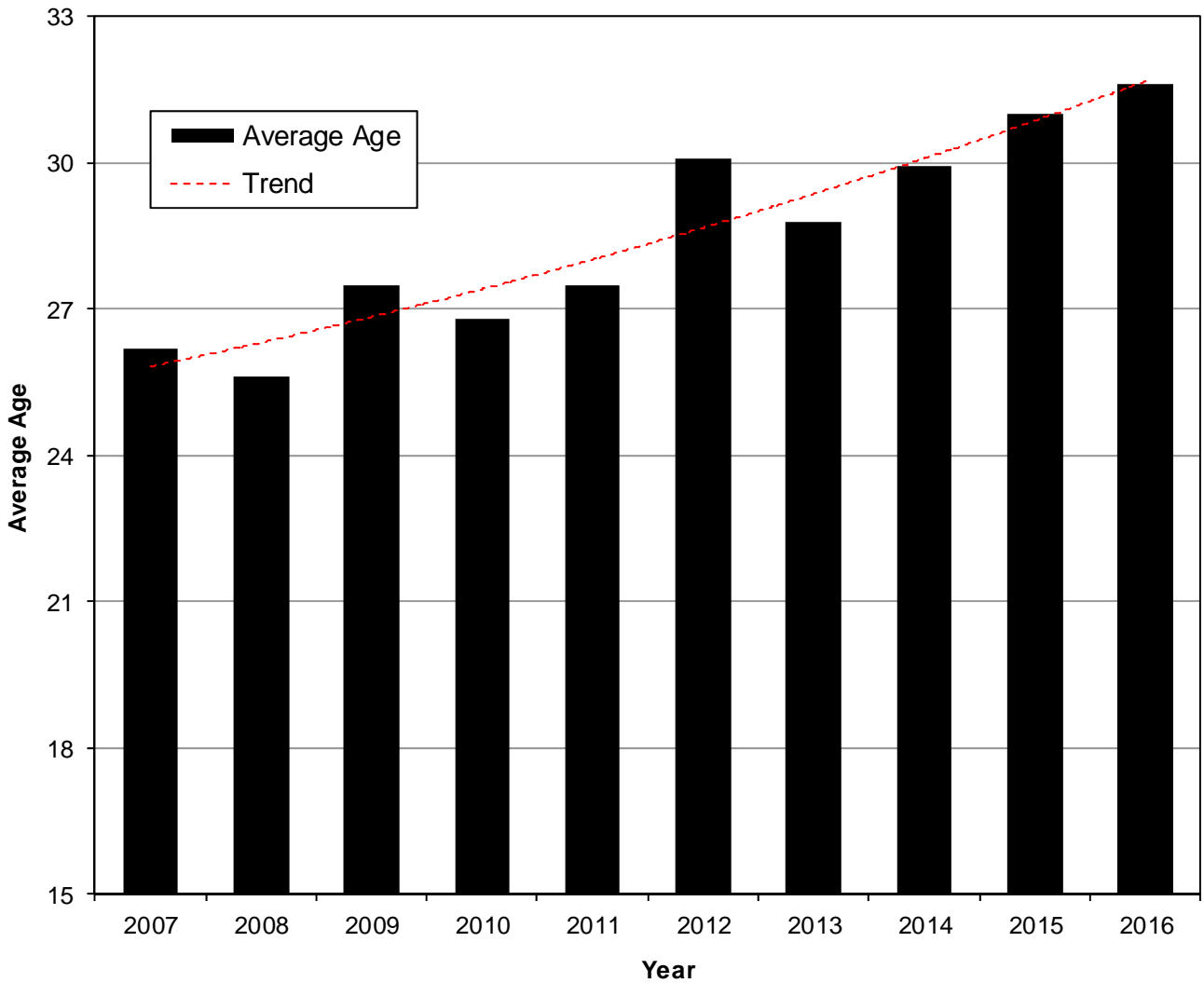


- Bicycle-motor vehicle crashes were highest among ages 10-24 years.
- Bicycle-motor vehicle crashes were lowest among ages 60+ years.

Trends

Bicyclists in Crashes by Average Age (Utah 2007-2016)

Bicyclists	
Year	Total Mean Age
2007	26.20
2008	25.60
2009	27.50
2010	26.80
2011	27.50
2012	30.10
2013	28.80
2014	29.95
2015	31.01
2016	31.60
Average	28.51

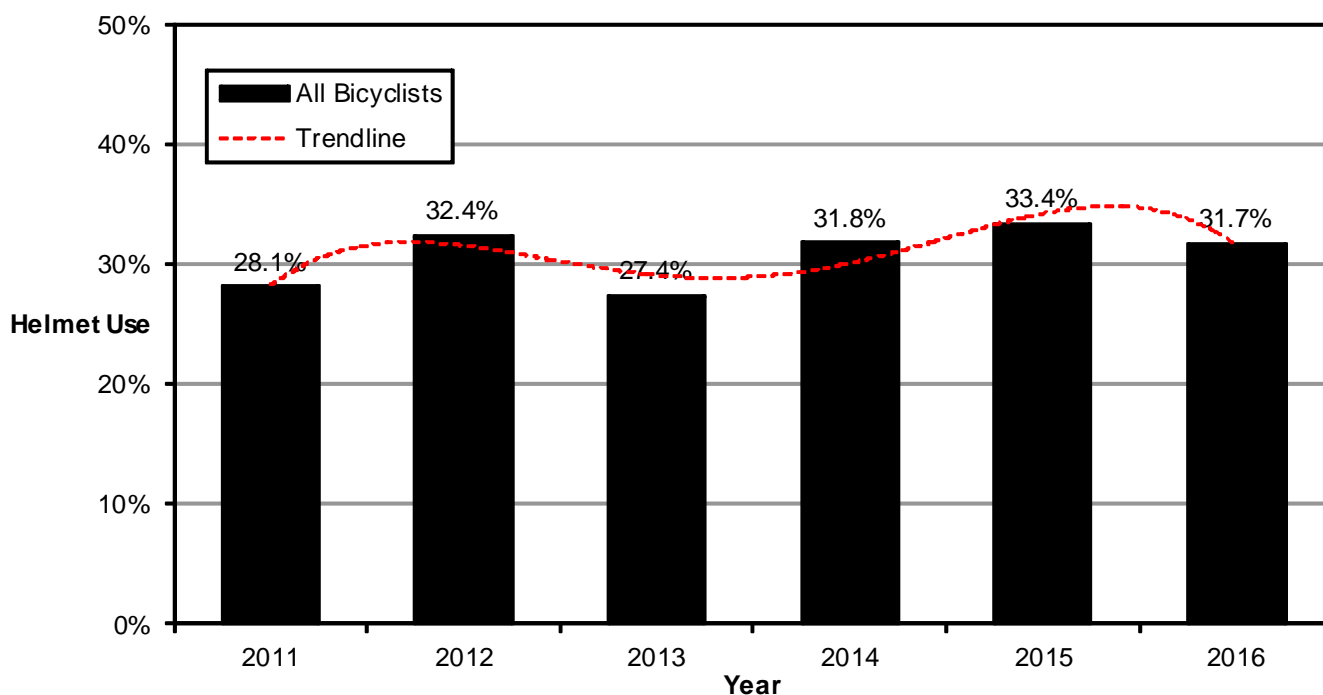


- The average age of bicyclists in crashes has shown an increasing trend over the last 10 years.

Helmets

Helmet Use of Bicyclists in Crashes (Utah 2011-2016)

Year	Bicyclists											
	Non-Injured			Injured			Killed			Total		
	No Hlmt	Helmet	%	No Hlmt	Helmet	%	No Hlmt	Helmet	%	No Hlmt	Helmet	%
2011	34	5	12.8%	180	78	30.2%	3	2	40.0%	217	85	28.1%
2012	18	5	21.7%	190	96	33.6%	3	0	0.0%	211	101	32.4%
2013	24	10	29.4%	289	106	26.8%	3	3	50.0%	316	119	27.4%
2014	36	9	20.0%	402	193	32.4%	4	4	50.0%	442	206	31.8%
2015	18	12	40.0%	384	188	32.9%	2	3	60.0%	404	203	33.4%
2016	25	6	19.4%	383	184	32.5%	4	1	20.0%	412	191	31.7%
Total	155	47	23.3%	1,828	845	31.6%	19	13	40.6%	2,002	905	31.1%



- Overall helmet use by bicyclists in crashes has fluctuated around the six year average of 31.1%.
- 2015 had the highest percent of helmet use by bicyclists in crashes while 2013 had the lowest percent.

Helmet Use of Bicyclists in Crashes (Utah 2016)

Helmet Use	Bicyclists									
	Non-Injured		Injured		Killed		Total			
	#	%	#	%	#	%	#	%	#	%
Helmet Not Worn	25	67.6%	383	62.5%	4	80.0%	412	62.9%		
Helmet Worn	6	16.2%	184	30.0%	1	20.0%	191	29.2%		
Unknown	6	16.2%	46	7.5%	0	0.0%	52	7.9%		
Total	37	100.0%	613	100.0%	5	100.0%	655	100.0%		



- Where helmet use is known for bicyclists, 31.7% of bicyclists were wearing a helmet.

Bicycle-Motor Vehicle Crash Conditions

Bicyclists in Crashes by County (Utah 2016)

Bicyclists								
County	Non-Injured		Injured		Killed		Total	
	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.
Salt Lake	21	0.19	325	2.90	2	0.02	348	3.10
Weber	4	0.16	51	2.06	0	0.00	55	2.22
Grand	0	0.00	2	2.09	0	0.00	2	2.09
Garfield	0	0.00	1	2.01	0	0.00	1	2.01
Davis	5	0.15	63	1.84	0	0.00	68	1.99
Utah	5	0.08	101	1.71	3	0.05	109	1.84
Millard	0	0.00	2	1.58	0	0.00	2	1.58
Cache	0	0.00	17	1.38	0	0.00	17	1.38
Wasatch	0	0.00	4	1.31	0	0.00	4	1.31
Tooele	0	0.00	8	1.23	0	0.00	8	1.23
Washington	0	0.00	18	1.12	0	0.00	18	1.12
Summit	1	0.25	3	0.74	0	0.00	4	0.99
Duchesne	0	0.00	2	0.98	0	0.00	2	0.98
Carbon	0	0.00	2	0.98	0	0.00	2	0.98
Emery	0	0.00	1	0.98	0	0.00	1	0.98
Sevier	0	0.00	2	0.94	0	0.00	2	0.94
Juab	0	0.00	1	0.91	0	0.00	1	0.91
Iron	0	0.00	4	0.80	0	0.00	4	0.80
Box Elder	1	0.19	3	0.56	0	0.00	4	0.75
Uintah	0	0.00	2	0.55	0	0.00	2	0.55
Sanpete	0	0.00	1	0.34	0	0.00	1	0.34
Beaver	0	0.00	0	0.00	0	0.00	0	0.00
Daggett	0	0.00	0	0.00	0	0.00	0	0.00
Kane	0	0.00	0	0.00	0	0.00	0	0.00
Morgan	0	0.00	0	0.00	0	0.00	0	0.00
Piute	0	0.00	0	0.00	0	0.00	0	0.00
Rich	0	0.00	0	0.00	0	0.00	0	0.00
San Juan	0	0.00	0	0.00	0	0.00	0	0.00
Wayne	0	0.00	0	0.00	0	0.00	0	0.00
Statewide	37	0.12	613	2.01	5	0.02	655	2.15

- Urban areas (2.38) had a much higher total bicycle-motor vehicle crash rate per 10,000 population than rural areas (0.86).
- Salt Lake (3.10), Weber (2.22), Grand (2.09), and Garfield (2.01) counties had the highest rates per population of total bicyclists in crashes per 10,000 population.
- Salt Lake County accounted for 53% of the bicyclists in crashes.
- Beaver, Daggett, Kane, Morgan, Piute, Rich, San Juan, and Wayne counties had no bicyclists in crashes.

Bicyclists								
Location	Non-Injured		Injured		Killed		Total	
	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.	#	Rate per 10,000 Pop.
Urban	35	0.14	575	2.22	5	0.02	615	2.38
Rural	2	0.04	38	0.82	0	0.00	40	0.86
Total	37	0.12	613	2.01	5	0.02	655	2.15

Bicycle-Motor Vehicle Crash Conditions

Age of Bicyclists in Crashes (Utah 2016)

Bicyclists								
Age	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
0-4	1	2.7%	5	0.8%	0	0.0%	6	0.9%
5-9	4	10.8%	33	5.4%	1	20.0%	38	5.8%
10-14	3	8.1%	65	10.6%	0	0.0%	68	10.4%
15-19	4	10.8%	84	13.7%	1	20.0%	89	13.6%
20-24	3	8.1%	76	12.4%	0	0.0%	79	12.1%
25-29	1	2.7%	47	7.7%	0	0.0%	48	7.3%
30-34	4	10.8%	50	8.2%	0	0.0%	54	8.2%
35-39	2	5.4%	46	7.5%	0	0.0%	48	7.3%
40-44	2	5.4%	36	5.9%	0	0.0%	38	5.8%
45-49	2	5.4%	38	6.2%	0	0.0%	40	6.1%
50-54	1	2.7%	38	6.2%	0	0.0%	39	6.0%
55-59	0	0.0%	37	6.0%	2	40.0%	39	6.0%
60-64	1	2.7%	16	2.6%	1	20.0%	18	2.7%
65-69	1	2.7%	14	2.3%	0	0.0%	15	2.3%
70+	0	0.0%	12	2.0%	0	0.0%	12	1.8%
Unknown	8	21.6%	16	2.6%	0	0.0%	24	3.7%
Total	37	100.0%	613	100.0%	5	100.0%	655	100.0%

- Over one-third (36%) of the bicyclists in crashes were 10-24 years.

Driver Age (Utah 2016)

Drivers (Bicycle-Motor Vehicle Crashes)								
Age	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
<15	0	0.0%	0	0.0%	0	0.0%	0	0.0%
15-19	1	3.2%	50	8.2%	0	0.0%	51	7.9%
20-24	3	9.7%	81	13.3%	0	0.0%	84	13.0%
25-29	4	12.9%	56	9.2%	0	0.0%	60	9.3%
30-34	2	6.5%	59	9.7%	1	20.0%	62	9.6%
35-39	4	12.9%	58	9.5%	0	0.0%	62	9.6%
40-44	2	6.5%	41	6.7%	1	20.0%	44	6.8%
45-49	3	9.7%	43	7.1%	0	0.0%	46	7.1%
50-54	0	0.0%	35	5.8%	1	20.0%	36	5.6%
55-59	0	0.0%	36	5.9%	1	20.0%	37	5.7%
60-64	2	6.5%	27	4.4%	1	20.0%	30	4.7%
65-69	2	6.5%	24	3.9%	0	0.0%	26	4.0%
70-74	0	0.0%	14	2.3%	0	0.0%	14	2.2%
75-79	1	3.2%	20	3.3%	0	0.0%	21	3.3%
80-84	0	0.0%	8	1.3%	0	0.0%	8	1.2%
85+	0	0.0%	8	1.3%	0	0.0%	8	1.2%
Unknown	7	22.6%	48	7.9%	0	0.0%	55	8.5%
Total	31	100.0%	608	100.0%	5	100.0%	644	100.0%

- Over half (54% of known) of drivers in total bicycle-motor vehicle crashes were under age 40 years.
- The average age of a driver that hit a bicyclist was 37 years.

Bicycle-Motor Vehicle Crash Conditions

Gender of Bicyclists in Crashes (Utah 2016)

Bicyclists								
Gender	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Male	27	73.0%	475	77.5%	3	60.0%	505	77.1%
Female	6	16.2%	134	21.9%	2	40.0%	142	21.7%
Unknown	4	10.8%	4	0.7%	0	0.0%	8	1.2%
Total	37	100.0%	613	100.0%	5	100.0%	655	100.0%



- Most bicyclists (77%) in crashes were male.

Driver Gender (Utah 2016)

Drivers (Bicycle-Motor Vehicle Crashes)								
Gender	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Male	18	58.1%	306	50.3%	3	60.0%	327	50.8%
Female	10	32.3%	267	43.9%	2	40.0%	279	43.3%
Unknown	3	9.7%	35	5.8%	0	0.0%	38	5.9%
Total	31	100.0%	608	100.0%	5	100.0%	644	100.0%

- A slight majority of drivers in total bicycle-motor vehicle crashes (54% of known) were male.

Bicycle-Motor Vehicle Crashes by Month (Utah 2016)

Bicyclists								
Month	Non-Injured		Injured		Killed		Total	
	#	Rate per Day	#	Rate per Day	#	Rate per Day	#	Rate per Day
January	0	0.0	12	0.4	0	0.000	12	0.4
February	1	0.0	24	0.8	0	0.000	25	0.9
March	3	0.1	35	1.1	0	0.000	38	1.2
April	3	0.1	48	1.6	2	0.067	53	1.8
May	4	0.1	68	2.2	0	0.000	72	2.3
June	4	0.1	80	2.7	1	0.033	85	2.8
July	8	0.3	71	2.3	1	0.032	80	2.6
August	3	0.1	86	2.8	0	0.000	89	2.9
September	3	0.1	77	2.6	0	0.000	80	2.7
October	3	0.1	51	1.6	0	0.000	54	1.7
November	2	0.1	40	1.3	0	0.000	42	1.4
December	3	0.1	21	0.7	1	0.032	25	0.8
Total	37	0.1	613	1.7	5	0.014	655	1.8

- August (2.9), June (2.8), and September (2.7) had the highest rates per day of total bicycle-motor vehicle crashes.

Bicycle-Motor Vehicle Crash Conditions

Bicycle-Motor Vehicle Crashes by Day of Week (Utah 2016)

Bicyclists								
Day of Week	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Sunday	1	2.7%	31	5.1%	2	40.0%	34	5.2%
Monday	5	13.5%	95	15.5%	0	0.0%	100	15.3%
Tuesday	6	16.2%	84	13.7%	0	0.0%	90	13.7%
Wednesday	9	24.3%	104	17.0%	2	40.0%	115	17.6%
Thursday	6	16.2%	119	19.4%	0	0.0%	125	19.1%
Friday	5	13.5%	99	16.2%	1	20.0%	105	16.0%
Saturday	5	13.5%	81	13.2%	0	0.0%	86	13.1%
Total	37	100.0%	613	100.0%	5	100.0%	655	100.0%

- The highest percentage of total bicycle-motor vehicle crashes occurred on Thursday (19%).

Bicycle-Motor Vehicle Crashes by Hour (Utah 2016)

Bicyclists								
Hour	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Midnight	1	2.7%	3	0.5%	0	0.0%	4	0.6%
1 a.m.	0	0.0%	0	0.0%	0	0.0%	0	0.0%
2 a.m.	0	0.0%	2	0.3%	0	0.0%	2	0.3%
3 a.m.	0	0.0%	0	0.0%	0	0.0%	0	0.0%
4 a.m.	0	0.0%	0	0.0%	0	0.0%	0	0.0%
5 a.m.	0	0.0%	2	0.3%	0	0.0%	2	0.3%
6 a.m.	1	2.7%	13	2.1%	0	0.0%	14	2.1%
7 a.m.	0	0.0%	26	4.2%	0	0.0%	26	4.0%
8 a.m.	3	8.1%	40	6.5%	0	0.0%	43	6.6%
9 a.m.	1	2.7%	32	5.2%	0	0.0%	33	5.0%
10 a.m.	0	0.0%	22	3.6%	0	0.0%	22	3.4%
11 a.m.	2	5.4%	27	4.4%	0	0.0%	29	4.4%
Noon	4	10.8%	39	6.4%	0	0.0%	43	6.6%
1 p.m.	0	0.0%	31	5.1%	0	0.0%	31	4.7%
2 p.m.	3	8.1%	39	6.4%	0	0.0%	42	6.4%
3 p.m.	4	10.8%	53	8.6%	0	0.0%	57	8.7%
4 p.m.	3	8.1%	67	10.9%	1	20.0%	71	10.8%
5 p.m.	4	10.8%	55	9.0%	1	20.0%	60	9.2%
6 p.m.	3	8.1%	54	8.8%	1	20.0%	58	8.9%
7 p.m.	3	8.1%	23	3.8%	0	0.0%	26	4.0%
8 p.m.	2	5.4%	29	4.7%	0	0.0%	31	4.7%
9 p.m.	2	5.4%	28	4.6%	0	0.0%	30	4.6%
10 p.m.	1	2.7%	21	3.4%	1	20.0%	23	3.5%
11 p.m.	0	0.0%	7	1.1%	1	20.0%	8	1.2%
Total	37	100.0%	613	100.0%	5	100.0%	655	100.0%

- Total bicycle-motor vehicle crashes were highest between 3:00 p.m. and 6:59 p.m.

Bicycle-Motor Vehicle Crash Conditions

Contributing Factors of Bicyclists in Crashes (Utah 2016)

Bicyclists								
Contributing Factors	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
None	14	37.8%	275	44.9%	2	40.0%	291	44.4%
Wrong Side of Road	2	5.4%	66	10.8%	0	0.0%	68	10.4%
Improper Crossing	4	10.8%	50	8.2%	1	20.0%	55	8.4%
Failure to Obey Traffic Signs/Signals	3	8.1%	33	5.4%	0	0.0%	36	5.5%
Failure to Yield Right of Way	1	2.7%	31	5.1%	1	20.0%	33	5.0%
Not Visible	2	5.4%	29	4.7%	0	0.0%	31	4.7%
Darting	2	5.4%	27	4.4%	0	0.0%	29	4.4%
Inattentive	2	5.4%	16	2.6%	0	0.0%	18	2.7%
Improper Turn/Merge	0	0.0%	7	1.1%	0	0.0%	7	1.1%
Improper Passing	0	0.0%	5	0.8%	0	0.0%	5	0.8%
In Roadway Improperly	0	0.0%	5	0.8%	0	0.0%	5	0.8%
Other	2	5.4%	25	4.1%	1	20.0%	28	4.3%
Unknown	5	13.5%	44	7.2%	0	0.0%	49	7.5%
Total	37	100.0%	613	100.0%	5	100.0%	655	100.0%

- Wrong side of road, improper crossing, and failure to obey traffic signs/signals were the leading contributing factors for bicyclists in total crashes.
- No bicyclist contributing factors were listed for 48% (of known) of the total bicyclists in crashes.
- Other contributing factors to consider are driver factors, roadway factors (such as high speeds, inadequate on-road bicycle facilities), and vehicle factors (such as vehicle design, vehicle size).

Bicyclist Location in Bicycle-Motor Vehicle Crashes (Utah 2016)

Bicyclists								
Bicyclist Location	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Marked Crosswalk at Intersection	12	32.4%	184	30.0%	2	40.0%	198	30.2%
In Roadway (not at intersection)	9	24.3%	115	18.8%	1	20.0%	125	19.1%
Shoulder	4	10.8%	87	14.2%	0	0.0%	91	13.9%
Sidewalk	2	5.4%	65	10.6%	0	0.0%	67	10.2%
Unmarked Crosswalk	3	8.1%	51	8.3%	1	20.0%	55	8.4%
Bike Path/Lane	0	0.0%	39	6.4%	0	0.0%	39	6.0%
Mid-Block Crosswalk	0	0.0%	12	2.0%	0	0.0%	12	1.8%
Outside Right of Way	0	0.0%	7	1.1%	0	0.0%	7	1.1%
Median	0	0.0%	2	0.3%	0	0.0%	2	0.3%
Shared Use Path/Trail	0	0.0%	2	0.3%	0	0.0%	2	0.3%
Other	2	5.4%	25	4.1%	0	0.0%	27	4.1%
Unknown	5	13.5%	24	3.9%	1	20.0%	30	4.6%
Total	37	100.0%	613	100.0%	5	100.0%	655	100.0%

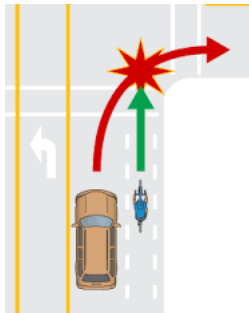
- For total crashes, the largest percentages of bicyclist location prior to the crash were marked crosswalk (32% of known), in roadway (20% of known), shoulder (15% of known), and sidewalk (11% of known).
- Bicycles are considered vehicles and have a legal right to the road.

Bicycle-Motor Vehicle Crash Conditions

Bicyclist Action in Bicycle-Motor Vehicle Crashes (Utah 2016)

Bicyclist Action	Bicyclists							
	Non-Injured		Injured		Killed		Total	
	#	%	#	%	#	%	#	%
Cycling Along Roadway with Traffic	6	16.2%	176	28.7%	1	20.0%	183	27.9%
Entering or Crossing Road	12	32.4%	161	26.3%	3	60.0%	176	26.9%
Cycling on Sidewalk	6	16.2%	161	26.3%	0	0.0%	167	25.5%
Cycling Along Roadway Against Traffic	7	18.9%	74	12.1%	0	0.0%	81	12.4%
In Roadway Other	0	0.0%	10	1.6%	0	0.0%	10	1.5%
Waiting to Cross Roadway	1	2.7%	3	0.5%	0	0.0%	4	0.6%
Adjacent to Roadway	0	0.0%	2	0.3%	0	0.0%	2	0.3%
Going to/from School	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Other	1	2.7%	12	2.0%	0	0.0%	13	2.0%
Unknown	4	10.8%	13	2.1%	1	20.0%	18	2.7%
Total	37	100.0%	613	100.0%	5	100.0%	655	100.0%

- For total crashes, the largest percentages of bicyclist action prior to the crash were cycling along roadway with traffic (29% of known), entering or crossing road (28% of known), cycling on sidewalk (26% of known), and cycling along roadway against traffic (13%).



Motor Vehicle Maneuver Prior to Crash (Utah 2016)

Vehicle Maneuver	Motor Vehicles (Bicycle-Motor Vehicle Crashes)							
	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Turning Right	9	29.0%	222	35.9%	1	20.0%	232	35.4%
Straight Ahead	11	35.5%	216	34.9%	3	60.0%	230	35.1%
Turning Left	5	16.1%	98	15.8%	1	20.0%	104	15.9%
Stopped/Slowing in Traffic Lane	1	3.2%	20	3.2%	0	0.0%	21	3.2%
Entering/Leaving Traffic Lane	1	3.2%	19	3.1%	0	0.0%	20	3.1%
Parked/Parking	0	0.0%	10	1.6%	0	0.0%	10	1.5%
Backing	1	3.2%	9	1.5%	0	0.0%	10	1.5%
Making U-turn	0	0.0%	3	0.5%	0	0.0%	3	0.5%
Changing Lanes	0	0.0%	2	0.3%	0	0.0%	2	0.3%
Overtaking/Passing	0	0.0%	2	0.3%	0	0.0%	2	0.3%
Other	1	3.2%	6	1.0%	0	0.0%	7	1.1%
Unknown	2	6.5%	12	1.9%	0	0.0%	14	2.1%
Total	31	100.0%	619	100.0%	5	100.0%	655	100.0%

- For total bicycle-motor vehicle crashes, the leading motor vehicle maneuvers prior to the crash were turning right (35%), straight ahead (35%), and turning left (16%).

Bicycle-Motor Vehicle Crash Conditions

Bicycle-Motor Vehicle Crashes by Speed Limit (Utah 2016)



Motor Vehicles (Bicycle-Motor Vehicle Crashes)								
Speed Limit	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
5-15 MPH	1	3.2%	19	3.1%	0	0.0%	20	3.1%
20-25 MPH	4	12.9%	138	22.3%	1	20.0%	143	21.8%
30-35 MPH	8	25.8%	160	25.8%	2	40.0%	170	26.0%
40-45 MPH	7	22.6%	97	15.7%	1	20.0%	105	16.0%
50-55 MPH	0	0.0%	11	1.8%	0	0.0%	11	1.7%
60+ MPH	0	0.0%	5	0.8%	0	0.0%	5	0.8%
Unknown	11	35.5%	189	30.5%	1	20.0%	201	30.7%
Total	31	100.0%	619	100.0%	5	100.0%	655	100.0%



- Nearly all (92% of known) of bicycle-motor vehicle crashes occurred where the speed limit was 20-45 MPH.
- The highest number of bicycle crashes occurred on roads with speed limits of 25 MPH, 35 MPH, and 40 MPH.

Travel Speed of Motor Vehicles in Bicycle Crashes (Utah 2016)

Motor Vehicles (Bicycle-Motor Vehicle Crash)								
Travel Speed	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Parked	0	0.0%	7	1.1%	0	0.0%	7	1.1%
Stopped	0	0.0%	15	2.4%	0	0.0%	15	2.3%
1-9 MPH	7	22.6%	176	28.4%	1	20.0%	184	28.1%
10-19 MPH	5	16.1%	93	15.0%	0	0.0%	98	15.0%
20-29 MPH	1	3.2%	60	9.7%	1	20.0%	62	9.5%
30-39 MPH	4	12.9%	32	5.2%	2	40.0%	38	5.8%
40-49 MPH	0	0.0%	11	1.8%	0	0.0%	11	1.7%
50+ MPH	0	0.0%	6	1.0%	0	0.0%	6	0.9%
Unknown	14	45.2%	219	35.4%	1	20.0%	234	35.7%
Total	31	100.0%	619	100.0%	5	100.0%	655	100.0%

- Over two-thirds (67% of known) of motor vehicles were travelling 1-19 MPH in crashes with bicycles.

Drivers in Bicycle Crashes with Contributing Factors (Utah 2016)

Drivers/Motor Vehicles (Bicycle-Motor Vehicle Crashes)								
Driver/Vehicle with a Contributing Factor(s)	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Yes	17	54.8%	369	59.6%	2	40.0%	388	59.2%
No	12	38.7%	218	35.2%	2	40.0%	232	35.4%
Unknown	2	6.5%	32	5.2%	1	20.0%	35	5.3%
Total	31	100.0%	619	100.0%	5	100.0%	655	100.0%

- 59% of drivers in total bicycle crashes had a contributing factor.

Bicycle-Motor Vehicle Crash Conditions

Contributing Factors in Bicycle Crashes (Utah 2016)

Drivers/Motor Vehicles (Bicycle-Motor Vehicle Crashes)								
Contributing Factors	PDO Crashes		Injury Crashes		Fatal Crashes		Total	
	#	%	#	%	#	%	#	%
Failed to Yield Right of Way	9	33.3%	263	49.0%	1	14.3%	273	47.8%
Other Improper Driving	0	0.0%	52	9.7%	0	0.0%	52	9.1%
Hit and Run	3	11.1%	38	7.1%	1	14.3%	42	7.4%
Improper Turn	4	14.8%	22	4.1%	1	14.3%	27	4.7%
Vision Obscured by Glare	1	3.7%	19	3.5%	0	0.0%	20	3.5%
Driver Distraction	0	0.0%	17	3.2%	1	14.3%	18	3.2%
Vision Obscured by Building, Sign	1	3.7%	17	3.2%	0	0.0%	18	3.2%
Vision Obscured by Moving Vehicle	0	0.0%	17	3.2%	0	0.0%	17	3.0%
Disregard Traffic Signal/Sign	0	0.0%	12	2.2%	0	0.0%	12	2.1%
Vision Obscured by Other	2	7.4%	8	1.5%	0	0.0%	10	1.8%
Vision Obscured by Weather	2	7.4%	7	1.3%	0	0.0%	9	1.6%
Vision Obscured by Parked Vehicle	1	3.7%	7	1.3%	0	0.0%	8	1.4%
Failed to Keep in Proper Lane	1	3.7%	6	1.1%	0	0.0%	7	1.2%
Improper Backing	1	3.7%	6	1.1%	0	0.0%	7	1.2%
Vehicle Defective Condition	0	0.0%	6	1.1%	0	0.0%	6	1.1%
Vision Obscured by Vegetation	0	0.0%	6	1.1%	0	0.0%	6	1.1%
Driver Condition Other	0	0.0%	5	0.9%	0	0.0%	5	0.9%
Driving Under the Influence	0	0.0%	3	0.6%	1	14.3%	4	0.7%
Followed Too Closely	0	0.0%	4	0.7%	0	0.0%	4	0.7%
Driver Emotional Prior to Crash	0	0.0%	3	0.6%	0	0.0%	3	0.5%
Improper Parking/Stopping	0	0.0%	3	0.6%	0	0.0%	3	0.5%
Improper Passing	0	0.0%	3	0.6%	0	0.0%	3	0.5%
Swerved or Evasive Action	0	0.0%	2	0.4%	1	14.3%	3	0.5%
Windshield/Window Obscured	1	3.7%	1	0.2%	1	14.3%	3	0.5%
Disregard Road Markings	0	0.0%	2	0.4%	0	0.0%	2	0.4%
Driver Asleep/Fatigue	0	0.0%	2	0.4%	0	0.0%	2	0.4%
Driver Illness/Medical	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Improper Lane Change	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Improper Signal	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Ran Off Road	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Reckless/Aggressive Driving	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Speed Too Fast	0	0.0%	1	0.2%	0	0.0%	1	0.2%
Wrong Side/Wrong Way	1	3.7%	0	0.0%	0	0.0%	1	0.2%
Total	27	100.0%	537	100.0%	7	100.0%	571	100.0%

- Failed to yield right of way (48%), hit and run (7%), and improper turn (5%) were the leading contributing factors in total bicycle-motor vehicle crashes.

Appendix



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Appendix

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Population, Vehicle Miles Traveled, Injuries, Deaths, and Crashes (Utah 1947-2016)

Historical Information														
Year	Population	Vehicle Miles Traveled (VMT)	Injured Persons		Deaths		Property Damage Only Crashes		Injury Crashes		Fatal Crashes		Total Crashes	
			#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT
1947	636,000	2,132,000,000	3,747	175.8	186	8.724	6,123	287.2	2,603	122.1	159	7.458	8,885	416.7
1948	653,000	2,351,000,000	3,982	169.4	220	9.358	7,117	302.7	2,675	113.8	169	7.188	9,961	423.7
1949	670,800	2,475,000,000	3,808	153.9	174	7.030	8,327	336.4	2,614	105.6	151	6.101	11,092	448.2
1950	695,900	2,839,000,000	4,459	157.1	188	6.622	9,532	335.8	3,004	105.8	169	5.953	12,705	447.5
1951	706,100	3,015,000,000	5,132	170.2	207	6.866	12,806	424.7	3,495	115.9	174	5.771	16,475	546.4
1952	724,000	3,050,000,000	5,140	168.5	246	8.066	14,052	460.7	3,474	113.9	184	6.033	17,710	580.7
1953	739,100	3,232,000,000	4,945	153.0	209	6.467	12,883	398.6	3,305	102.3	185	5.724	16,373	506.6
1954	750,500	3,336,000,000	4,495	134.7	209	6.265	11,911	357.0	3,016	90.4	176	5.276	15,103	452.7
1955	782,800	3,075,000,000	5,036	163.8	203	6.602	14,504	471.7	3,390	110.2	166	5.398	18,060	587.3
1956	808,800	3,310,000,000	4,812	145.4	215	6.495	14,045	424.3	3,310	100.0	176	5.317	17,531	529.6
1957	826,300	3,366,000,000	5,022	149.2	222	6.595	15,476	459.8	3,397	100.9	181	5.377	19,054	566.1
1958	845,200	3,531,000,000	5,658	160.2	193	5.466	18,287	517.9	3,762	106.5	171	4.843	22,220	629.3
1959	869,900	3,784,000,000	5,992	158.4	205	5.418	19,389	512.4	3,946	104.3	171	4.519	23,506	621.2
1960	900,000	3,852,000,000	9,128	237.0	256	6.646	20,702	537.4	5,576	144.8	200	5.192	26,478	687.4
1961	936,000	3,997,000,000	10,412	260.5	236	5.904	19,278	482.3	6,257	156.5	197	4.929	25,732	643.8
1962	958,000	4,240,000,000	11,133	262.6	233	5.495	19,459	458.9	6,968	164.3	186	4.387	26,613	627.7
1963	974,000	4,549,000,000	12,603	277.0	263	5.781	19,344	425.2	7,798	171.4	198	4.353	27,340	601.0
1964	978,000	4,790,000,000	14,096	294.3	295	6.159	20,570	429.4	8,636	180.3	246	5.136	29,452	614.9
1965	991,000	4,997,000,000	14,361	287.4	281	5.623	20,427	408.8	8,856	177.2	242	4.843	29,525	590.9
1966	1,009,000	5,079,000,000	14,994	295.2	331	6.517	20,616	405.9	9,076	178.7	265	5.218	29,957	589.8
1967	1,019,000	5,257,000,000	14,401	273.9	275	5.231	21,873	416.1	8,888	169.1	231	4.394	30,992	589.5
1968	1,029,000	5,539,000,000	15,539	280.5	289	5.218	24,724	446.4	9,550	172.4	258	4.658	34,532	623.4
1969	1,047,000	5,802,000,000	15,977	275.4	308	5.309	24,665	425.1	9,850	169.8	251	4.326	34,766	599.2
1970	1,066,000	6,108,000,000	17,076	279.6	335	5.485	24,168	395.7	10,722	175.5	276	4.519	35,166	575.7
1971	1,101,150	6,544,000,000	18,073	276.2	337	5.150	27,429	419.1	11,399	174.2	280	4.279	39,108	597.6
1972	1,135,100	6,969,000,000	18,261	262.0	382	5.481	27,914	400.5	11,630	166.9	312	4.477	39,856	571.9
1973	1,168,950	7,274,000,000	18,415	253.2	361	4.963	26,220	360.5	11,710	161.0	304	4.179	38,234	525.6
1974	1,196,950	7,457,000,000	16,268	218.2	228	3.058	20,637	276.7	10,560	141.6	204	2.736	31,401	421.1
1975	1,233,900	7,942,000,000	17,762	223.6	274	3.450	24,740	311.5	11,441	144.1	245	3.085	36,426	458.7
1976	1,272,050	8,420,000,000	18,315	217.5	254	3.017	22,435	266.4	11,685	138.8	225	2.672	34,345	407.9
1977	1,315,950	9,054,000,000	19,728	217.9	360	3.976	25,562	282.3	12,652	139.7	310	3.424	38,524	425.5
1978	1,363,750	9,826,000,000	21,029	214.0	376	3.827	28,946	294.6	13,423	136.6	315	3.206	42,684	434.4
1979	1,415,950	9,811,000,000	20,798	212.0	328	3.343	26,732	272.5	13,449	137.1	287	2.925	40,468	412.5
1980	1,474,000	10,645,000,000	17,828	167.5	335	3.147	21,589	202.8	11,701	109.9	292	2.743	33,582	315.5
1981	1,515,000	10,733,000,000	18,090	168.5	364	3.391	23,844	222.2	11,824	110.2	321	2.991	35,989	335.3
1982	1,558,000	10,947,000,000	17,538	160.2	296	2.704	26,425	241.4	11,504	105.1	263	2.402	38,192	348.9
1983	1,595,000	11,228,000,000	18,910	168.4	283	2.520	28,419	253.1	12,317	109.7	253	2.253	40,989	365.1
1984	1,622,000	11,642,000,000	20,487	176.0	315	2.706	33,738	289.8	13,477	115.8	274	2.354	47,489	407.9
1985	1,643,000	12,035,000,000	21,346	177.4	303	2.518	33,684	279.9	13,917	115.6	270	2.243	47,871	397.8
1986	1,663,000	12,253,000,000	21,350	174.2	312	2.546	32,426	264.6	13,988	114.2	276	2.253	46,690	381.0
1987	1,678,000	12,679,000,000	19,237	151.7	297	2.342	33,386	263.3	13,599	107.3	271	2.137	47,256	372.7
1988	1,690,000	13,229,853,875	19,066	144.1	297	2.245	35,614	269.2	13,377	101.1	258	1.950	49,249	372.3
1989	1,706,000	13,933,977,565	19,843	142.4	303	2.175	37,110	266.3	13,941	100.1	269	1.931	51,320	368.3
1990	1,729,227	14,649,064,030	20,608	140.7	272	1.857	37,823	258.2	14,632	99.9	236	1.611	52,691	359.7
1991	1,780,870	15,390,400,930	19,540	127.0	271	1.761	33,443	217.3	13,763	89.4	229	1.488	47,435	308.2
1992	1,838,149	16,263,289,670	22,490	138.3	269	1.654	34,760	213.7	15,665	96.3	235	1.445	50,660	311.5
1993	1,889,393	17,055,044,750	25,763	151.1	303	1.777	38,357	224.9	17,088	100.2	259	1.519	55,704	326.6

Population, Vehicle Miles Traveled, Injuries, Deaths, and Crashes (Utah 1947-2016)

Historical Information (Continued)														
Year	Population	Vehicle Miles Traveled (VMT)	Injured Persons		Deaths		Property Damage Only Crashes		Injury Crashes		Fatal Crashes		Total Crashes	
			#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT	#	Rate Per 100 Million VMT
1994	1,946,721	18,091,944,321	28,436	157.2	343	1.896	40,243	222.4	18,726	103.5	303	1.675	59,272	327.6
1995	1,995,228	18,798,488,669	28,343	150.8	325	1.729	37,532	199.7	19,828	105.5	284	1.511	57,644	306.6
1996	2,042,893	19,433,341,748	30,711	158.0	321	1.652	40,225	207.0	20,988	108.0	292	1.503	61,505	316.5
1997	2,099,409	20,407,590,239	31,238	153.1	366	1.793	33,512	164.2	21,131	103.5	309	1.514	54,952	269.3
1998	2,141,632	21,236,980,216	30,232	142.4	350	1.648	34,337	161.7	19,427	91.5	308	1.450	54,072	254.6
1999	2,193,014	21,867,355,694	29,959	137.0	360	1.646	32,971	150.8	19,513	89.2	318	1.454	52,802	241.5
2000	2,246,467	22,517,131,427	30,086	133.6	373	1.657	33,269	147.7	19,564	86.9	318	1.412	53,151	236.0
2001	2,290,632	23,398,734,621	29,375	125.5	291	1.244	33,113	141.5	19,332	82.6	258	1.103	52,703	225.2
2002	2,331,826	24,438,992,554	30,433	124.5	328	1.342	33,542	137.2	19,552	80.0	274	1.121	53,368	218.4
2003	2,372,457	23,963,242,376	28,352	118.3	309	1.289	31,842	132.9	18,285	76.3	262	1.093	50,389	210.3
2004	2,430,224	24,641,658,091	29,638	120.3	296	1.201	34,222	138.9	19,423	78.8	260	1.055	53,905	218.8
2005	2,505,844	25,129,538,952	29,221	116.3	282	1.122	35,158	139.9	19,545	77.8	235	0.935	54,938	218.6
2006	2,576,228	26,166,885,473	27,433	104.8	287	1.097	37,674	144.0	18,264	69.8	249	0.952	56,187	214.7
2007	2,636,077	26,824,244,333	27,420	102.2	299	1.115	42,368	157.9	18,619	69.4	258	0.962	61,245	228.3
2008	2,691,122	25,883,467,343	24,672	95.3	276	1.066	38,997	150.7	17,125	66.2	245	0.947	56,367	217.8
2009	2,731,558	26,217,108,843	22,847	87.1	244	0.931	35,398	135.0	15,752	60.1	217	0.828	51,367	195.9
2010	2,775,426	26,617,169,711	21,675	81.4	253	0.951	34,155	128.3	14,995	56.3	218	0.819	49,368	185.5
2011	2,816,440	26,379,900,505	22,325	84.6	243	0.921	36,418	138.1	15,645	59.3	224	0.849	52,287	198.2
2012	2,855,782	26,637,413,207	22,336	83.9	217	0.815	34,635	130.0	15,765	59.2	200	0.751	50,600	190.0
2013	2,902,663	27,014,745,900	22,740	84.2	220	0.814	39,301	145.5	16,134	59.7	202	0.748	55,637	206.0
2014	2,941,836	27,574,227,734	23,364	84.7	256	0.928	37,388	135.6	16,426	59.6	222	0.805	54,036	196.0
2015	2,990,632	29,393,158,598	25,350	86.2	278	0.946	42,089	143.2	17,665	60.1	258	0.878	60,012	204.2
2016	3,051,217	30,778,571,634	26,738	86.9	280	0.910	43,465	141.2	18,747	60.9	259	0.841	62,471	203.0
Total	112,766,117	913,098,523,009	1,285,617	140.8	19,697	2.157	1,923,365	210.6	853,361	93.5	16,943	1.856	2,793,669	306.0

POPULATION SOURCE: US Census Bureau, Population Division, Annual Estimates of the Resident Population: April 1, 2010 to July 1, 2016

VEHICLE MILES TRAVELED SOURCE: Utah Department of Transportation, Utah Highway Performance Monitoring System, www.udot.utah.gov

Number of Licensed Drivers by Gender (Utah 2012-2016)

Licensed Drivers									
Gender	Year					Total	% All Years	2016 %	% Change 2012-2016
	2012	2013	2014	2015	2016				
Female	977,728	940,572	944,012	977,506	1,032,899	4,872,717	49.4%	49.6%	5.6%
Male	1,034,027	958,767	958,202	992,636	1,050,609	4,994,241	50.6%	50.4%	1.6%
Total	2,011,755	1,899,339	1,902,214	1,970,142	2,083,508	9,866,958	100.0%	100.0%	3.6%

SOURCE: Utah Department of Public Safety, Driver License Division

Number of Licensed Drivers by Age (Utah 2012-2016)

Licensed Drivers									
Age	Year					Total	% All Years	2016 %	% Change 2012-2016
	2012	2013	2014	2015	2016				
15-19	186,586	156,822	157,613	167,344	183,665	852,030	8.6%	8.8%	-1.6%
20-24	209,423	198,238	195,747	201,510	216,044	1,020,962	10.3%	10.4%	3.2%
25-29	216,925	200,937	196,010	202,485	216,053	1,032,410	10.5%	10.4%	-0.4%
30-34	221,267	207,415	201,024	202,253	204,847	1,036,806	10.5%	9.8%	-7.4%
35-39	185,990	189,387	193,197	202,078	211,261	981,913	10.0%	10.1%	13.6%
40-44	165,667	158,792	160,269	165,974	181,011	831,713	8.4%	8.7%	9.3%
45-49	153,639	137,357	137,492	144,916	154,785	728,189	7.4%	7.4%	0.7%
50-54	156,797	144,279	141,071	140,081	138,682	720,910	7.3%	6.7%	-11.6%
55-59	141,052	136,965	137,600	140,467	144,169	700,253	7.1%	6.9%	2.2%
60-64	115,238	115,900	119,146	125,025	132,542	607,851	6.2%	6.4%	15.0%
65-69	84,538	90,147	94,449	101,006	107,775	477,915	4.8%	5.2%	27.5%
70-74	60,566	65,207	67,905	70,745	79,990	344,413	3.5%	3.8%	32.1%
75-79	45,029	45,398	46,134	48,366	52,752	237,679	2.4%	2.5%	17.2%
80-84	33,466	30,258	31,128	32,374	33,948	161,174	1.6%	1.6%	1.4%
85+	35,572	22,237	23,429	25,518	25,984	132,740	1.3%	1.2%	-27.0%
Total	2,011,755	1,899,339	1,902,214	1,970,142	2,083,508	9,866,958	100.0%	100.0%	3.6%

SOURCE: Utah Department of Public Safety, Driver License Division

Number of Registered Vehicles by Vehicle Type (Utah 2007-2016)

Vehicles					
Year	Heavy Truck	Light Truck	Motorcycle	Passenger Car	Total
2007	62,860	585,413	56,146	1,297,242	2,001,661
2008	66,578	601,655	64,376	1,334,906	2,067,515
2009	67,124	598,513	78,302	1,349,596	2,093,535
2010	63,927	588,733	71,957	1,340,300	2,064,917
2011	64,288	585,689	69,774	1,346,803	2,066,554
2012	66,052	590,451	73,112	1,375,020	2,104,635
2013	68,188	593,301	74,324	1,405,155	2,140,968
2014	68,636	642,637	75,593	1,411,649	2,198,515
2015	69,469	703,165	73,606	1,394,826	2,241,066
2016	71,643	793,332	71,760	1,375,373	2,312,108
Total	668,765	6,282,889	708,950	13,630,870	21,291,474
% All Years	3.1%	29.5%	3.3%	64.0%	100.0%
2016 %	3.1%	34.3%	3.1%	59.5%	100.0%
% Change 07-16	14.0%	35.5%	27.8%	6.0%	15.5%

SOURCE: Utah State Tax Commission, Economic and Statistical Unit

Population by County and Rural/Urban (Utah 2012-2016)

Population by County									
County	Year					Total	% All Years	2016 %	% Change 2012-2016
	2012	2013	2014	2015	2016				
Beaver	6,493	6,462	6,424	6,344	6,463	32,186	0.2%	0.2%	-0.5%
Box Elder	50,259	50,807	51,435	51,998	53,139	257,638	1.7%	1.7%	5.7%
Cache	115,931	117,198	118,177	120,060	122,753	594,119	4.0%	4.0%	5.9%
Carbon	21,242	20,935	20,659	20,430	20,399	103,665	0.7%	0.7%	-4.0%
Daggett	1,093	1,138	1,127	1,110	1,095	5,563	0.0%	0.0%	0.2%
Davis	316,165	322,796	329,448	335,768	342,281	1,646,458	11.2%	11.2%	8.3%
Duchesne	19,003	20,010	20,260	20,781	20,337	100,391	0.7%	0.7%	7.0%
Emery	10,919	10,738	10,625	10,352	10,216	52,850	0.4%	0.3%	-6.4%
Garfield	5,085	5,045	4,995	4,991	4,986	25,102	0.2%	0.2%	-1.9%
Grand	9,314	9,332	9,420	9,493	9,579	47,138	0.3%	0.3%	2.8%
Iron	46,706	46,632	47,185	48,294	49,937	238,754	1.6%	1.6%	6.9%
Juab	10,282	10,255	10,421	10,566	11,010	52,534	0.4%	0.4%	7.1%
Kane	7,199	7,200	7,228	7,120	7,334	36,081	0.2%	0.2%	1.9%
Millard	12,524	12,594	12,560	12,649	12,694	63,021	0.4%	0.4%	1.4%
Morgan	9,822	10,240	10,636	11,091	11,437	53,226	0.4%	0.4%	16.4%
Piute	1,523	1,514	1,479	1,503	1,466	7,485	0.1%	0.0%	-3.7%
Rich	2,269	2,260	2,274	2,296	2,319	11,418	0.1%	0.1%	2.2%
Salt Lake	1,064,462	1,080,761	1,091,389	1,104,622	1,121,354	5,462,588	37.1%	36.8%	5.3%
San Juan	14,900	14,988	15,208	15,707	16,895	77,698	0.5%	0.6%	13.4%
Sanpete	27,997	28,183	28,367	28,801	29,409	142,757	1.0%	1.0%	5.0%
Sevier	20,716	20,823	20,821	20,940	21,267	104,567	0.7%	0.7%	2.7%
Summit	37,867	38,387	39,005	39,481	40,307	195,047	1.3%	1.3%	6.4%
Tooele	59,872	60,749	61,599	62,879	64,833	309,932	2.1%	2.1%	8.3%
Uintah	34,682	35,737	36,958	37,789	36,373	181,539	1.2%	1.2%	4.9%
Utah	540,170	552,386	561,232	574,796	592,299	2,820,883	19.1%	19.4%	9.7%
Wasatch	25,385	26,609	27,789	29,165	30,528	139,476	0.9%	1.0%	20.3%
Washington	144,613	147,628	151,857	155,450	160,245	759,793	5.2%	5.3%	10.8%
Wayne	2,724	2,728	2,722	2,703	2,702	13,579	0.1%	0.1%	-0.8%
Weber	236,565	238,528	240,536	243,453	247,560	1,206,642	8.2%	8.1%	4.6%
Total	2,855,782	2,902,663	2,941,836	2,990,632	3,051,217	14,742,130	100.0%	100.0%	6.8%

Population by Rural/Urban									
Location	Year					Total	% All Years	2016 %	% Change 2012-2016
	2012	2013	2014	2015	2016				
Rural	437,876	443,366	449,197	456,483	464,725	2,251,647	15.3%	15.2%	6.1%
Urban	2,417,906	2,459,297	2,492,639	2,534,149	2,586,492	12,490,483	84.7%	84.8%	7.0%
Total	2,855,782	2,902,663	2,941,836	2,990,632	3,051,217	14,742,130	100.0%	100.0%	6.8%

SOURCE: US Census Bureau, Population Division, Annual Estimates of the Resident Population

Vehicle Miles Traveled (Utah 2012-2016)

Vehicle Miles Traveled (VMT) by County									
County	Year					Total	% All Years	2016 %	% Change 2012-2016
	2012	2013	2014	2015	2016				
Beaver	252,117,515	264,273,530	271,441,615	285,668,399	302,022,680	1,375,523,739	1.0%	1.0%	19.8%
Box Elder	877,987,924	895,366,745	911,258,124	973,650,820	1,009,642,458	4,667,906,071	3.3%	3.3%	15.0%
Cache	876,333,868	880,249,558	899,034,530	954,924,377	996,100,235	4,606,642,568	3.3%	3.2%	13.7%
Carbon	305,487,505	310,210,602	325,114,810	344,944,836	350,517,918	1,636,275,671	1.2%	1.1%	14.7%
Daggett	30,438,948	30,980,594	32,333,132	33,130,562	34,688,088	161,571,324	0.1%	0.1%	14.0%
Davis	2,531,978,716	2,538,778,040	2,590,155,574	2,802,079,612	2,958,308,026	13,421,299,968	9.5%	9.6%	16.8%
Duchesne	275,632,039	278,837,297	283,292,481	327,841,653	327,555,029	1,493,158,499	1.1%	1.1%	18.8%
Emery	381,235,825	351,741,796	355,911,485	385,315,624	389,642,855	1,863,847,585	1.3%	1.3%	2.2%
Garfield	110,821,951	108,004,544	114,369,392	123,257,738	130,135,377	586,589,002	0.4%	0.4%	17.4%
Grand	320,551,102	334,853,328	351,843,888	380,937,171	405,860,282	1,794,045,771	1.3%	1.3%	26.6%
Iron	700,741,148	721,883,152	753,358,572	794,760,784	834,634,738	3,805,378,394	2.7%	2.7%	19.1%
Juab	384,471,346	391,200,663	368,529,836	418,803,123	449,324,230	2,012,329,198	1.4%	1.5%	16.9%
Kane	171,426,081	161,183,477	134,067,109	153,248,460	166,222,940	786,148,067	0.6%	0.5%	-3.0%
Millard	455,557,644	490,465,889	502,461,730	533,404,164	564,737,246	2,546,626,673	1.8%	1.8%	24.0%
Morgan	132,992,730	131,337,257	133,124,873	142,800,901	148,889,806	689,145,567	0.5%	0.5%	12.0%
Plute	28,419,196	28,071,707	28,998,248	30,998,770	32,621,547	149,109,468	0.1%	0.1%	14.8%
Rich	49,199,382	49,105,907	50,335,948	52,670,161	54,963,433	256,274,831	0.2%	0.2%	11.7%
Salt Lake	8,748,849,791	8,881,223,683	9,079,005,254	9,466,255,889	9,843,910,619	46,019,245,236	32.5%	32.0%	12.5%
San Juan	307,019,232	312,364,995	285,774,882	323,528,333	331,430,475	1,560,117,917	1.1%	1.1%	8.0%
Sanpete	205,894,610	210,754,236	216,577,317	238,237,698	248,128,202	1,119,592,063	0.8%	0.8%	20.5%
Sevier	319,951,941	311,210,506	319,525,913	350,052,040	366,262,607	1,667,003,007	1.2%	1.2%	14.5%
Summit	728,385,245	745,619,650	763,364,577	816,647,139	856,810,746	3,910,827,357	2.8%	2.8%	17.6%
Tooele	823,015,404	818,748,872	822,143,266	863,609,453	902,588,007	4,230,105,002	3.0%	2.9%	9.7%
Uintah	414,298,005	419,416,805	427,770,171	436,479,501	438,206,845	2,136,171,327	1.5%	1.4%	5.8%
Utah	3,830,963,768	3,956,113,485	4,084,949,059	4,403,917,995	4,721,897,971	20,997,842,278	14.9%	15.3%	23.3%
Wasatch	334,601,920	333,402,298	353,223,181	393,786,656	401,768,608	1,816,782,663	1.3%	1.3%	20.1%
Washington	1,379,312,655	1,405,655,035	1,420,310,654	1,565,553,150	1,661,091,853	7,431,923,347	5.3%	5.4%	20.4%
Wayne	47,366,479	47,544,289	48,768,211	52,333,595	54,698,673	250,711,247	0.2%	0.2%	15.5%
Weber	1,612,361,237	1,606,147,960	1,647,183,902	1,744,319,994	1,795,910,140	8,405,923,233	5.9%	5.8%	11.4%
Total	26,637,413,207	27,014,745,900	27,574,227,734	29,393,158,598	30,778,571,634	141,398,117,073	100.0%	100.0%	15.5%

Vehicle Miles Traveled (VMT) by Rural/Urban									
Location	Year					Total	% All Years	2016 %	% Change 2012-2016
	2012	2013	2014	2015	2016				
Rural	7,657,613,172	7,746,578,139	7,853,588,761	8,456,107,581	8,801,352,790	40,515,240,443	28.7%	28.6%	14.9%
Urban	18,979,800,035	19,268,167,761	19,720,638,973	20,937,051,017	21,977,218,844	100,882,876,630	71.3%	71.4%	15.8%
Total	26,637,413,207	27,014,745,900	27,574,227,734	29,393,158,598	30,778,571,634	141,398,117,073	100.0%	100.0%	15.5%

SOURCE: Utah Department of Transportation, Utah Highway Performance Monitoring System, www.udot.utah.gov

Glossary

Alcohol-Related Driver Crash: A crash in which the driver was cited for driving under the influence, at least one driver had a blood alcohol concentration of .08 grams per deciliter or above, or if the investigating officer suspected the driver used alcohol.

Contributing Factor: The circumstances reported by the investigating officer surrounding a crash that contributed to the crash or the crash severity.

Crash Rate: Crashes per 100 million vehicle miles traveled unless otherwise specified.

Death Rate: Traffic deaths per 100 million vehicle miles traveled unless otherwise specified.

Distracted Driver Crash: A crash in which the investigating officer suspected a driver to be engaging in an activity that had the potential to divert the driver's attention from the task of driving.

Drowsy Driver Crash: A crash in which a driver condition was listed as fatigue/asleep.

Drug Driver Fatal Crash: A crash resulting in one or more deaths involving at least one driver with a positive drug test.

Drug-Related Driver Crash: A crash in which the driver was cited for driving under the influence of drugs, at least one driver had a positive drug test, or if the investigating officer suspected the driver used drugs.

Drunk Driver Fatal Crash: A crash resulting in one or more deaths involving at least one driver with a blood alcohol concentration of .08 grams per deciliter or above.

Fatal Crash: A crash involving a motor vehicle traveling on a trafficway resulting in the death of at least one person within 30 days of the crash.

Fatality Analysis Reporting System (FARS): National data system containing data on all fatal traffic crashes in the U.S.

Holiday Crash: The following criteria was used to determine the number of days in the holiday period: 1) If a holiday occurred on Sunday, Tuesday, Wednesday, or Saturday, then it was considered a three day holiday (the day prior to the holiday, the holiday, and the day after the holiday); 2) If a holiday occurred on Monday, then it was considered a four day holiday (Friday through Monday); 3) If a holiday occurred on Friday, then it was considered a four day holiday (Thursday through Sunday); 4) If a holiday occurred on Thursday, then it was considered a five day holiday (Wednesday through Sunday).

Incapacitating Injury: Any injury, other than a fatal

injury, which prevents the injured person from walking, driving, or normally continuing the activities the person was capable of performing before the injury occurred. Often defined as needing help from the scene.

Injury Crash: A crash in which one or more persons sustained a possible injury, non-incapacitating injury, or an incapacitating injury.

Miles per Hour (MPH): A unit of speed expressing the distance traveled (in miles) to the time spent traveling (in hours).

Motorcycle Crash: A crash involving a motorcycle or moped.

Non-Incapacitating Injury: Any injury, other than a fatal injury or an incapacitating injury, which is evident to observers at the scene of the crash in which the injury occurred. Examples: bruise, cut, bloody nose.

Out-of-State Driver: A driver licensed from a state/country other than Utah who is in a crash. Some of these drivers may reside in Utah and have not yet applied for a Utah driver license.

Possible Injury: Complaint of pain without visible injury.

Property Damage Only (PDO) Crash: A crash which results in damage to the motor vehicle or other property but without injury or death to any person.

Restraint Use: Restraint use is reported for occupants in a passenger car, light truck, van, SUV, or large truck. Occupants are coded as restrained if they reported using a shoulder/lap belt, lap belt, shoulder belt, or a child safety seat at the scene of the crash.

Rural: Counties with population less than 100,000 people. Rural counties in Utah are Beaver, Box Elder, Carbon, Daggett, Duchesne, Emery, Garfield, Grand, Iron, Juab, Kane, Millard, Morgan, Piute, Rich, San Juan, Sanpete, Sevier, Summit, Tooele, Uintah, Wasatch, and Wayne.

Speed Crash: A crash where a driver exceeded posted speed limits or was driving too fast for conditions.

Teenage Driver Crash: A crash involving a driver aged 15 to 19 years.

Urban: Counties with population 100,000 people and above. Urban counties in Utah are Cache, Davis, Salt Lake, Utah, Washington, and Weber.

Vehicle Miles Traveled (VMT): The number of miles traveled in a year for a given area.

Notable Dates in Utah Highway Safety History

- 1906** First motor vehicle traffic crash death in Utah.
- 1912** The world's first electric traffic light installed in Salt Lake City.
- 1915** Driving age established at 16 years and older.
- 1926** Stop sign law implemented.
- 1935** Alcohol drinking age set at 21 years and older.
- 1935** Utah Highway Patrol granted statewide police authority.
- 1960** First sections of interstate opened in Utah.
- 1969** Motorcycle helmet required for all ages on roads with speed limits 35 mph or higher.
- 1972** Highest number of deaths recorded in one year in Utah (382).
- 1973** Maximum speed limit lowered to 55 mph.
- 1977** Motorcycle helmet law changed, helmets required only for riders under 18 on all roads.
- 1983** Illegal to operate a motor vehicle at or above .08 BAC.
- 1984** First child restraint law.
- 1986** First seat belt law.
- 1987** Maximum speed limit raised to 65 mph.
- 1991** Amount of property damage for reportable crashes increased from \$400 to \$750.
- 1992** Illegal for drivers under age 21 years to drive with any detectable amount of alcohol.
- 1996** Amount of property damage required for reportable crashes increased to \$1,000.
- 1996** Maximum speed limit raised to 75 mph.
- 1997** Increased age that children need to be restrained from up to 8 years to up to 10 years.
- 1997** Non-traffic crashes excluded. These accounted for about 10% of crashes in prior years.
- 1999** First Graduated Driver License law implemented.
- 2000** Secondary seat belt law for drivers and all passengers of motor vehicles.
- 2000** Increased age for use of child restraints up to age five years.
- 2006** State of Utah Investigating Officer's Report of Traffic Crash DI-9 Form updated.
- 2007** Hand-held telephone use prohibited, enforced if a moving traffic violation is committed.
- 2008** Increased age for use of child restraints up to age eight years.
- 2008** Maximum speed limit raised to 80 mph on selected parts of rural I-15.
- 2009** Amount of property damage required for reportable crashes increased to \$1,500.
- 2009** All drivers convicted of DUI required to use ignition interlock system.
- 2009** Text messaging prohibited while operating a moving motor vehicle.
- 2014** Maximum speed limit raised to 70 mph on urban freeways.
- 2015** Seat belt law changed to primary enforcement law.

UTAH HIGHWAY SAFETY OFFICE
highwaysafety.utah.gov

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