



Young Driver Safety

Motor vehicle crashes are a leading killer of American teens.¹ On average, more than six teens were killed in the United States each day of 2019 as a result of motor vehicle crashes.² Four thousand three hundred fifty-six (4,356) people were killed in crashes involving young drivers (aged 15 - 20) in 2019; 1,603 were young drivers and 880 were passengers of young drivers. The remaining 1,873 victims were non-occupants and the occupants of the other vehicles involved in crashes with young drivers.³ Additionally, 205,000 young drivers were injured in motor vehicle crashes in 2019.⁴ The estimated economic cost of police-reported crashes involving young drivers between 15 and 20 years old was \$40.8 billion (2002).⁵ When adjusted for inflation only, these costs amount to \$60 billion in 2020 dollars.⁶

Teen and young adult novice drivers are more likely to be involved in fatal crashes because they lack driving experience and tend to take greater risks. Graduated driver licensing (GDL) programs introduce teens to the driving experience gradually by phasing in full driving privileges over time and in lower risk settings. These programs have been effective in reducing teen crash deaths. Optimal GDL laws have multiple components, including a three-stage licensing process and restrictions on nighttime driving, number and age of passengers, and cell phone usage. While all states have at least one element of a GDL program, no state has a comprehensive GDL law that includes all seven optimal elements recommended by Advocates for Highway and Auto Safety in its annual *Roadmap of State Highway Safety Laws*.⁷

GDL Program Facts

- In states that have adopted GDL programs, studies have found overall crash reductions among teen drivers of about 10 to 30 percent.⁸
- The fatal crash rate per mile driven is nearly three times as high for 16-19 year-olds as it is for ages 20 and over. Risk is highest at ages 16-17.⁹
- Compared to GDL programs without any of the seven GDL components evaluated by the NHTSA, fatal crash involvement rates were 16 percent to 21 percent lower in GDL programs that included age requirements plus three or more months of waiting before the intermediate stage, a nighttime driving restriction, and either supervised driving of at least 30 hours or a passenger restriction.¹⁰
- Over 60 percent of teenage motor vehicle crash deaths in 2019 occurred between the hours of 3 p.m. and 3 a.m. The hours of 9 p.m. to midnight accounted for 18 percent of fatalities alone, while the periods of 3 p.m. to 6 p.m. and 6 p.m. to 9 p.m. accounted for 30 percent.¹¹ States with nighttime driving restrictions show crash reductions of up to 60 percent during restricted hours.¹²
- Fatal crash rates are 21 percent lower for 15-17 year-old drivers when prohibited from having any teenage passengers in their vehicles, compared to when two or more passengers were permitted.¹³
- For 16 and 17 year-old drivers, a 15 percent reduction in fatal crash incidence was associated with a limit of no more than one teen passenger for six months or longer, when compared to no passenger limit.¹⁴
- Delaying the minimum age for obtaining a learner's permit was associated with lower fatal crash rates for 15-17 year-olds combined; a one-year delay (e.g., from age 15 to 16) reduced the fatal crash rate by 13 percent.¹⁵
- A minimum holding period of five to six months reduces fatal crash rates by nine percent; however, extending the holding period to nine months to a year results in a 21 percent reduction.¹⁶
- A 2010 survey conducted by the Insurance Institute for Highway Safety (IIHS) shows that parents favor GDL laws that are as strict as or even stricter than currently exist in any state. More than half think the minimum licensing age should be 17 or older.¹⁷
- Almost three-quarters (74 percent) of teens approve of a single, comprehensive law that incorporates the key elements of GDL programs.¹⁸

- Some teens delay obtaining a driver’s license. As a consequence, they are not required to participate in age-specific GDL programs and do not benefit from the process. According to research by the Children’s Hospital of Philadelphia Center for Injury Research and Prevention and the AAA Foundation for Traffic Safety, “only 44 percent of respondents reported that they obtained a driver’s license within 12 months of the minimum age for licensing in their state, and only 54 percent reported that they obtained a license before their 18th birthday.”¹⁹
- Aging out of GDL is a problem because drivers who begin the licensing process at age 18, 19 or 20 still have a high crash risk due to inexperience and brain development.²⁰ As a result, older teen novice drivers are missing out on, yet still very much need, the safety benefits of GDL programs.²¹ A study showed that while GDL programs have likely contributed to a significant decline in teen driver crashes over the decade of 2005-2014, the improvements are not as strong for 18-20 year olds who have aged out of GDL.²²

Distracted Driving

- In 2019, nine percent of teen (15 to 19) drivers who were involved in fatal crashes were distracted at the time of the crash. Crashes involving a distracted teen driver claimed the lives of 322 people of which 163 were the teens.²³
- In a 2016 study by Liberty Mutual Insurance Group and Students Against Destructive Decisions, 27 percent of high school students admitted to texting while driving, and 68 percent admitted to using apps while driving.²⁴
- Drivers under the age of 20 have the highest proportion of distraction-related fatal crashes.²⁵
- The Center for Disease Control and Prevention’s Youth Risk Behavior Surveillance System (YRBSS) found that nearly 40 percent of high school students who drove in the past 30 days reported sending a text or email while driving in 2019.²⁶ An earlier review of the YRBSS also found that students who reported frequent texting while driving were less likely to wear a seatbelt, more likely to ride with a driver who had been drinking, and more likely to drink and drive.²⁷

Vehicle Safety Technologies

- Research by the IIHS shows dramatic reductions in crashes when passenger vehicles are equipped with advanced driver assistance systems (ADAS).²⁸ Specifically:
 - Automatic Emergency Braking (AEB) can decrease front-to-rear crashes with injuries by 56 percent;
 - Lane Departure Warning (LDW) can reduce single-vehicle, sideswipe and head-on injury crashes by over 20 percent;
 - Blind Spot Detection (BSD) can diminish injury crashes from lane change by nearly 25 percent;
 - Rear AEB can reduce backing crashes by 78 percent when combined with rearview camera and parking sensors; and,
 - Rear cross-traffic alert can reduce backing crashes by 22 percent.
- IIHS has found that if all vehicles in crashes with teen drivers were equipped with front crash prevention (forward collision warning and/or AEB), Lane Departure Warning/ Lane Keeping Assist (LDW / LKA), and blind spot monitoring, 32 percent of crashes involving a teen driver, 27 percent of injured teen drivers, and 36 percent of teen driver deaths could be prevented.²⁹

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¹ Centers for Disease Control and Prevention (CDC), National Center for Injury Prevention and Control (NCIPC). WISQARS (Web-based Injury Statistics Query and Reporting System). U.S. Department of Health and Human Services; July 2020. Available at <https://wisqars-viz.cdc.gov:8006/explore-data/home>. Accessed Feb. 2, 2021.

² Teenagers, Insurance Institute for Highway Safety, available at <https://www.iihs.org/topics/teenagers>.

³ Traffic Safety Facts: 2019 Data, Young Drivers, NHTSA, Jun. 2021, DOT HS 813 130 available at <https://crashstats.nhtsa.dot.gov/Api/Public/ViewPublication/813130>.

⁴ Id.

⁵ Traffic Safety Facts 2002: Young Drivers, NHTSA, DOT HS 809 619, available at <https://crashstats.nhtsa.dot.gov/Api/Public/ViewPublication/809619>.

⁶ CPI Inflation Calculator, US Bureau of Labor Statistics, https://www.bls.gov/data/inflation_calculator.htm.

⁷ Roadmap of State Highway Safety Laws, Advocates for Highway and Auto Safety, available at: <https://saferoads.org/roadmap-reports/>.

⁸ Graduated Licensing Laws and Fatal Crashes of Teenage Drivers: A National Study, Insurance Institute For Highway Safety, June 2010, available at <https://pubmed.ncbi.nlm.nih.gov/20544567/>.

⁹ Insurance Institute for Highway Safety, Fatality Facts 2018: Teenagers website, available at <https://www.iihs.org/topics/fatality-statistics/detail/teenagers>.

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- ²² Id.
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