



Traffic Safety Facts Banner

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EVALUATION OF THE REPEAL OF THE MOTORCYCLE HELMET LAWS IN KENTUCKY AND LOUISIANA

At the end of 2001, 20 states and the District of Columbia had laws requiring all motorcycle riders to wear helmets; 27 states had laws requiring helmet use only by riders under a certain age (usually 18); and 3 states had no laws regarding motorcycle helmet use. Mandatory helmet use laws first came into being following the issuance of highway safety program standards in 1967.

From the onset, the enactment of helmet laws has been a contentious issue in many states as public policy makers have debated the balance between personal freedoms and the societal cost of crashes. Those opposed to mandatory helmet laws generally argue that their individual rights are or will be infringed upon and that helmet use should be left to the choice of individual riders. Those who advocate for helmet laws note that helmets are effective in reducing injury severity and that society bears a significant portion of motorcycle crash costs, thereby establishing a public interest in requiring the use of reasonable safety equipment. Over the years, states have variously enacted, repealed, and reenacted universal, or all-rider, motorcycle helmet laws.

observed helmet use before and after law change

In 1998, Kentucky repealed its universal motorcycle helmet law to require helmet use only by motorcycle operators and passengers under the age of 21, those who possess a motorcycle instruction permit and those who have had a motorcycle operator's license for less than one year. A provision requiring helmet use by motorcycle owners who did not have at least \$10,000 of medical coverage was repealed effective July 2000. In 1999, Louisiana repealed its universal motorcycle helmet law to require helmet use only by motorcycle operators and passengers under the age of 18, and riders 18 and older who do not have medical insurance coverage of at least \$10,000.

Change in fatality and injury rates 2 years after helmet repeal in Ky, La, and U.S

Observed Helmet Use

Statewide observational surveys show that helmet use decreased following repeal of the universal helmet laws in both states from nearly full compliance to the 50 percent range without the laws.

Fatal Crashes, Rider Fatalities, and Fatality and Injury Rates Increase More than the National Rates

Motorcyclist fatalities increased in the near term by sizeable amounts -- by over 50 percent in Kentucky and by 100 percent in Louisiana. Injuries also increased substantially in both states.

Nationally, motorcyclists killed per 10,000 registered motorcycles increased 18 percent and injuries declined by 2.9 percent from 1997 to 2001. The increases in fatalities in Kentucky and Louisiana were more than twice the national average increase and the increase in injuries even greater.

Fatality Rates

In Kentucky, motorcyclists killed per 10,000 registered motorcycles averaged 6.4 in the two years just before the helmet law repeal and averaged 8.8 in the two years following its repeal, an increase of +37.5 percent. Persons injured per 10,000 registered motorcycles averaged 187 in the preceding two years and averaged 219 in the two years following its repeal, an increase of +17 percent.

In Louisiana, the fatality rate averaged 4.5 in the two years prior to helmet law repeal and rose to 7.9 in the year following, an increase of +75 percent. The injury rate averaged 126 persons in the two years before the helmet law repeal and increased to 152 persons in the year following repeal of the universal motorcycle helmet law, an increase of +20.6 percent.

At the same time, the number of registered motorcycles increased (by 20%), and vehicle miles traveled increased approximately 6%, based on national numbers. Calculating injury and fatality rates based on the number of registered motorcyclists takes into account the increase in the number of motorcycles. These findings are similar to the increases in motorcycle fatal crashes and fatalities in Arkansas (+29%) and Texas (+ 37%) following repeals of their universal helmet laws.

Conclusions

The 1998 universal helmet law repeal in Kentucky and the 1999 repeal in Louisiana produced similar effects. Observed helmet use dropped from nearly full compliance under the law to the 50 percent range without the law. The rate of motorcyclist fatalities per 10,000 registered motorcycles increased more than the national average -- by 37 percent in Kentucky and 75 percent in Louisiana. Injuries per registered motorcycles increased in both states (+17% and +21%) following the law repeals while the national injury rate per registered motorcycles decreased -2.9 percent.

The experience in Kentucky and Louisiana is similar to the experience in Arkansas and Texas (see TRAFFIC TECH 231), the other states that have repealed universal laws in recent years, leaving little doubt that such repeals have demonstrable negative safety consequences. The weight of the evidence is that motorcycle helmets reduce injury severity, that repeal of helmet laws decreases helmet use, and that states that repeal universal helmet laws experience increased motorcycle fatalities and injuries.

Crash Descriptions

The report includes a review of the legislative history of motorcycle helmet laws, studies of helmets and effectiveness, and national trends in registrations, travel, fatalities, and injuries. One chapter describes the fatal crashes that occurred in Kentucky and Louisiana in the months immediately after the law change. Five crash types classify 86 percent of the fatal motorcycle crashes: Ran off-road crashes (41%) involve a motorcyclist running off the roadway; Ran traffic control crashes (18%) occur when one vehicle fails to stop, remain stopped or yield; Oncoming or head-on crashes (11%) involve two vehicles traveling in opposite directions; Left-turn oncoming crashes (8%) involve a vehicle making a left turn in front of oncoming traffic; Motorcyclist down crashes (7%) involve a motorcyclist losing control and going down in the roadway or deliberately going down to avoid a perceived threat.

HOW TO ORDER

For a copy of *Evaluation of the Repeal of the Motorcycle Helmet Laws in Kentucky and Louisiana* (44 pages), write to Research and Technology, NHTSA, NTI-130, 400 Seventh Street, S.W., Washington, DC 20590, or send a fax to (301) 366-7096, or download <http://www.nhtsa.dot.gov/>. Linda Cosgrove, PhD, was the project manager.

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Washington, DC 20590

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