

Position Statement

Bicyclist, Motorcycle and Passenger Safety

This Position Statement was developed as an educational tool based on the opinion of the authors. It is not a product of a systematic review. Readers are encouraged to consider the information presented and reach their own conclusions.

Orthopaedic surgeons, the medical specialists most often called upon to treat injuries to cyclists—including fractures to the leg, foot, arm, wrist and spine—believe that a significant reduction in fatalities and injuries, as well as related health care costs, can be achieved through the adherence of various laws and safety practices. Cyclists should ride at safe speeds, obey traffic signs and rules, and stay alert for unsafe driving conditions such as slick roads and debris. Most importantly, cyclists and their passengers always should wear a helmet.

Motorcycle facts:

- The United States General Accounting Office (GAO)—tasked by Congress in the 1990s to evaluate available information on helmet effectiveness in preventing deaths and serious injuries, and the costs of injuries to unhelmeted motorcyclists to society—found that “lack of helmet use, does not affect the likelihood of a crash but increases the risk of a fatality when a crash occurs.”
- Additionally, the GAO found that “laws requiring all motorcyclists to wear helmets are the only strategy proved to be effective in reducing motorcyclist fatalities.”¹
- Motorcycle helmets that meet the Department of Transportation’s Federal Motor Vehicle Safety Standard 218 guidelines could reduce risk of fatal injuries in a crash by up to 42 percent and risk of a head injury by up to 69 percent.²
- In 2010, approximately \$3 billion in costs were saved as a result of helmet use in the United States; however, another \$1.4 billion could have been saved if all motorcyclists had worn helmets.”³
- A University of Southern California study that analyzed 3,600 traffic crash reports covering motorcycle crashes concluded that helmet use was the single most important factor in surviving motorcycle crashes.⁴

Bicycle facts:

- Americans of all ages have taken up bicycling for its fun, health, and fitness benefits, and as a mode of transportation. Since 2005, the national estimate of people commuting by bicycle⁸ increased by 46 percent—there were more than 882,000 bicyclists in 2013.
- In 2010, bicycle-related injuries accounted for an estimated 515,000 emergency department visits and nearly 800 bicyclists died on U.S. roads.⁵

Regardless of age, cyclists who do not wear a helmet face a significantly higher risk of trauma in a crash—more severe head trauma—and a greater likelihood of death.

The American Academy of Orthopaedic Surgeons (AAOS) endorses helmet use by all bicyclists, and motorcycle drivers and their passengers, as well as mandatory helmet use laws. The AAOS also encourages rides to adhere to safety laws and optimal practices.

References:

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3. Morbidity and Mortality Weekly Report: Helmet Use Among Motorcyclists Who Died in Crashes and Economic Cost Saves Associated With State Motorcycle Helmet Laws—United States, 2008-2010. Centers for Disease Control and Prevention website. <http://www.cdc.gov/mmwr/preview/mmwrhtml/mm6123a1.htm>. Published June 15, 2012. Accessed June 1, 2015.
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5. Centers for Disease Control and Prevention. *Bicycle-related injuries*. <http://www.cdc.gov/HomeandRecreationalSafety/Bicycle/>. Published May 28, 2013. Accessed June 5, 2015.

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For additional information, contact the Public Relations Department at 847-384-4036, or view the College of Surgeons' statement on helmet safety: <https://www.facs.org/about-ac/s/statements/78-motorcycle-helmet-laws> and <http://bulletin.facs.org/2013/09/mandating-the-use-of-motorcycle-helmets/>.